

SUCCESS FOR LIFE IN THAILAND:
EDUCATIONAL AND CULTURAL IMPLEMENTATION

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The purpose of this study was to investigate whether implementing *Success For Life* in Thailand would meet the needs of Thai public policy, the Thai educational system, and Thai culture. There were 46 respondents, including 4 early childhood professionals, 4 preschool owners, 6 directors, and 32 teachers. All respondents received the *Success For Life* training workshop. Each participant was requested to complete a questionnaire on their understanding and awareness of brain development and function, thoughts about implementing *Success For Life* in Thailand, and the appropriateness of *Success For Life* for the Thai educational system, Thai public policy, and Thai culture. In addition, all of the 4 early childhood professionals, 4 preschool owners, and 6 directors, and 8 teachers were interviewed to expand the information provided in the questionnaires. Two preschools implemented *Success For Life* in November 2000. Another 6 preschools implemented *Success For Life* in June 2001. Participating teachers in the preschools where *Success For Life* was implemented in November 2000 were also asked to write bimonthly journals. Journal entries included information about how participants changed their teaching styles after receiving the *Success For Life* training.

Research findings indicated that *Success For Life* was appropriate to the preschool level in Thailand. Recommendations for *Success For Life* implementation

in Thailand were 1) clarify the meaning of “teacher-centered” to conform with Thai policy, 2) modify the mathematics curriculum to reflect higher level concepts, 3) include ethics and financial education in the curriculum, 4) include in *Success For Life* staff development methods for teaching children with special needs, different learning styles, and in ESL programs, and 5) clarify how, in the *Success For Life* curriculum, children have a right to access to the Thai dream instead of the American Dream.

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CHAPTER I

INTRODUCTION

Recently, much of this political and media attention has been spurred on by research findings about early brain development and importance of the environment to support early childhood development. Moreover, the National Conference of State Legislatures (NCSL), which tracks the new brain-based policy, has identified several arenas in which research on the brain can influence state decisions: early childhood education, school readiness, child care, maternal and child health care, and family support (Groginsky, et al., 1998).

Increasing worldwide interest in brain research and neuroscience in the last decade has resulted from many developments, occurrences, and events. The development of a brain scanner and new brain imaging tools allow scientists to have totally noninvasive windows to the brains of both healthy and diseased individuals. Ronald Kotulak, the author of *Inside the Brain*, states that scientists have learned more in the past decades about how the human brain works because of new tools of imaging technology, such as brain scanners, which have helped scientists acquire much clearer pictures of the brain's structure, inner workings, and development (Kotulak, 1997). Brain Magnetic Resonance Imaging (MRI) provides graphic, three-dimensional images of the anatomical body and brain structure locating features and malfunction (McKinstry, 1999). The Positron Emission Tomography (PET) is another scanning device that allows scientists to see the fine structures of the brain (Howard Hughes Medical Center, 2000). These

technologies enable scientists to investigate aspects of brain development and analyze the pictures of young children's brains at various ages in order to visualize the brain areas that support each development at each stage. The advantages of technologies allow educators and early childhood professionals understand that the first three years of a child's life are critically important to brain development (Kotulak, 1997).

The government and other organizations have had an increased interest in learning more about young children's brains. On April 17, 1997 President Clinton and first lady, Hillary Rodham Clinton, hosted *The White House Conference on Early Childhood Development and Learning: What New Research on the Brain Tells Us About Our Youngest Children* (White House, 1997). The conference highlighted new scientific findings on brain development in very young children and pointed to the importance of children's earliest experiences in helping them get off to a strong and healthy start. In the conference, President Clinton stated,

Learning begins in the first days of life. Scientists are now discovering how young children develop emotionally and intellectually from their very first days, and how important it is for parents to begin immediately to talk, sing, even read to their infants... We already know we should start teaching children before they start school (White House, 1997).

The conference concentrated on the practical applications of the latest scientific studies on the brain, particularly for parents and caregivers. In addition, the conference was a call to action to all members of society to use the information from the brain findings to strengthen America's families (White House, 1997). As a result, many organizations have

responded to the public interest about brain studies and reorganized their priorities to take full advantage of the cognitive neuroscience revolution, and to keep it moving forward.

Examples of organizations that are dedicated to advancing the healthy development of young children include the Zero to Three (Zero to Three, 2000), the American Academy of Pediatrics (AAP) (American Academy of Pediatrics, 2000), and American Academy of Pediatrics Dentistry (AAPD)(American Academy of Pediatrics Dentistry, 2000).

Furthermore, numerous organizations and institutions, such as Dana Foundation, Dana Alliance for Brain Initiatives, National Institute on Child Health and Development, National Institute of Mental Health, National Institute of Neurological Disorders and Stroke, National Science Foundation, and James S. McDonnell Foundation, have provided funds to support brain research. The National Conference of State Legislatures (NCSL) has received funding from the Carnegie Corporation for a short project to educate state legislators about the policy implications of the recent research on early childhood brain development. The project is intended to emphasize for state policy makers the critical importance of children's experiences during the first three years of life (Project Description, 1997).

Although highly publicized brain research has had a tremendous impact on policy for young children and their families, other developments in recent years have also contributed to increased attention to early childhood issues. Over the past two decades, child development researchers have been confirming the importance of good quality early care and education for the nation's youngest children (Groginsky, et al., 1998). Good child care and early education programs can significantly enhance children's educational

attainment, level of socialization and long-term earning potential by acting as a buffer between children and a variety of risk factors (Whitney, et al. 1999). The discovery that babies' brains develop rapidly and early has far-reaching implications for education, health care, and child care.

The understanding and application of brain research to early childhood education promote media and public awareness regarding disease and disorder prevention, early intervention, and concerns about young children's development. For example, a Newsweek writer reported that neuroscientists now believe the formation of synapses begins in the motor cortex of the brain at about 2 months and that feelings, concepts, and language begin linking together between 7 and 12 months (Begley, 1997). In 1994, a seminar report titled "Starting Points: Meeting the Needs of Our Youngest Children" was released by Carnegie Corporation of New York. The "Starting Points" paper shows that rumblings of a quiet crisis were beginning to be heard across the United States. Reiner Singer, and Gilbert of International Creative Management, as well as a broad range of experts from the early childhood fields have launched "I Am Your Child", a national public awareness and engagement campaign for early childhood development. "I am Your Child" has educated parents and professionals about breakthrough discoveries in the process of brain development through mass media, community mobilization, public education and policy outreach, parents and caregivers. The "I am Your Child" campaign results in national attention to the necessity of promoting early healthy development and school readiness. In addition, the campaign collaborated with

over 150 national organizations to early childhood professionals, educators, families and members about the early childhood development (Reiner Foundation, 1997).

Contemporary new brain studies suggest that children learn at an astonishing rate from the moment of birth (Kotulak, 1997). What an infant experiences during the first few years affects the physical development of his or her brain, particularly the formation of neural connections required for learning and socialization. These new findings challenge old beliefs that the brain is fully formed at birth and that children do not start learning until they begin school. In addition, exhilarating studies on the brain and learning provide insights for teachers, in many ways providing new understandings, in other ways giving authoritative confirmation for classroom practices. Morrison (2000) suggests that early childhood programs should emphasize the importance of enabling teachers and families to support the development of the whole child - the academic/cognitive, social, emotional, physical, linguistic, and artistic/creative. Special emphasis is placed on family education and increasing public awareness of factors important to children's optimal development in early childhood. Developmental and neuroscience research-based curriculum frameworks are suggested as a way of benefiting teachers, children, and families by increasing the caliber of teaching and enriching the learning environment. As a result, early childhood professionals have developed enriched programs to support young children's development such as *Success For Life (SFL)*.

The *Success For Life* program, on which this study is based, was developed in 1997 by a team of early childhood educators and researchers at the University of North Texas under the guidance of George S. Morrison. *Success For Life* integrates brain

research findings into a learning system which prepares children with the cognitive, linguistic, socio-emotional, physical, and behavioral skills necessary for successful learning and living. *Success For Life* consists of five components:

The first component is Success For Life Through Academics and Reading (STAR). The STAR curriculum is infused with neuroscience research and is aligned with Developmentally Appropriate Practices (DAP), the Texas Essentials of Knowledge and Skills (TEKS), and Head Start Performance Standards. The curriculum includes eight (8) subject areas, covering literacy, mathematics, science, creative arts, wellness and healthy living, technology, social studies, and character education.

Family education and support, the second component, involves providing informational brochures, home learning kits, literacy, and music CDs to families. The goal is to educate families to create an enriched environment and supportive learning at home. Family education includes topics for parents of young children such as school expectations, reading readiness, literacy, math, and science, character education, physical education, community resources.

The third component is research and evaluation. The objective for this component is to study the effectiveness of *Success For Life* and to reveal evidence of achievement and developmental improvement in young children. Families and teachers are evaluated for changes in knowledge, beliefs and practices in the home and classroom.

Teacher training and technical assistance, the fourth component, involves five (5) comprehensive trainings each year for child-care givers, teachers, and their administrators. Mentor teachers visit sites regularly, provide technical assistance,

and support to further enhance teaching and learning.

Educational technology is the last component. Technology was found to be a powerful tool that can enhance the process of young children's learning and facilitate teachers' and parents' practices to gain the knowledge necessary for assisting their children to succeed in school and life. Ongoing evaluation is conducted on how technology influences learning and development. *Success For Life* uses technology to mentor teachers, discuss and model with individual and groups of teachers.

Primary studies of the *Success For Life* implementation suggest that participation in the program's initiatives increase teachers' abilities to create enriching learning environments and positively influence critical areas of children's development. In addition, findings indicate that teachers become more aware of how to apply what they learn to their programs, are more knowledgeable about new research and information relating to brain development and children's learning, and are better able to make connections between research findings and how to apply that research to daily activities, and create stimulating and enriching environments (Castro, 1998). Furthermore, research conducted with teachers in the Waco, Texas, Independent School District reveals that teachers show highly significant gains between pre and post-testing in the area of knowledge of brain development and function and strong trends in the areas of children's growth and development (Atkins & Kelly, 2000).

The success of the *Success For Life* program in the United States, under the direction of George S. Morrison, prompted Thai early childhood professionals' to consider implementing *Success For Life* in Thailand. As a result, in October 1999 Supitr

Samahito, Dean of the Faculty of Education, invited George S. Morrison to conduct a two-day *Success For Life* conference at Kasetsart University in Bangkok, Thailand. The response to this conference was very positive (Kasetsart University, Faculty of Education, 1999). As a result of the conference, Thai preschool owners and teachers showed great interest in integrating the *Success For Life* program into their preschools and classrooms. In October 2000, Professor Morrison was invited by Dean Samahito for a second time to provide a two-day *Success For Life* conference at Kasetsart University. Participants at the conference, included preschool owners and teachers, were so impressed with the program that they requested immediate teacher training to begin implementation of the program. The second *Success For Life* teacher training was held in November 2000. The teacher training helped early childhood teachers and childcare providers develop skills to create enriched and stimulating environments for young children and to develop sensitivity to young children's needs. The topics in the *Success For Life* teacher training included literacy, mathematics, science, music, nutrition, and wellness and healthy living. In addition, a *Success For Life* Center has been established at the Kasetsart University Laboratory School. The framework for a *Success For Life* Center in Thailand will be aligned with the curriculum component of *Success For Life* that is currently used by 4,000 children in thirteen public and private child care centers, preschools, and kindergartens in Texas. The *Success For Life* initiative in Thailand is implemented through Kasetsart University.

Thailand

The Kingdom of Thailand, located in Southeast Asia on the Gulf of Thailand and the Andaman Sea, shares boundaries with Myanmar (Burma) on the west and northwest, Laos on the east and northeast, Cambodia on the southeast, and Malaysia on the south. The capital, Bangkok, an attractive blend of Western and Thai architecture, was found in 1782. Thailand is approximately the size of the State of Texas. It covers a land area of 513,115 square kilometers (Tourism Authority of Thailand, 2000). Thailand has a population of approximately 61.8 million in 2000 (Department of Local Administration, 2000), of which around 6 million live in the capital city, Bangkok. The most important ethnic minority is Chinese. Other minority groups include Malays, Cambodians, Indians, non-Thai hill tribes, and some Vietnamese.

The word “Thailand” literally means ‘land of the free.’ Thailand is the only Southeast Asian country which has never been colonized by Western powers. Because of its religious and racial values, Thailand has been able to maintain a uniformly high level of development throughout its history. It is a predominantly Buddhist kingdom with a unique monarchy and has its own language and alphabet, along with its own literature, arts, music, and architecture (Tourism Authority of Thailand, 2000).

Education in Thailand began in the 13th century in the Sukothai dynasty (A.D.1238-1378). During the Sukothai period, the formal early childhood education had not been established. That is, there were neither preschools nor childcare centers. Buddhist monks played important roles to provide education for young children. Therefore, instruction was based on Buddhist teachings. However, young boys were more

acceptable to study with Buddhist monks at the temple, whereas girls had little opportunity to pursue formal learning. Typically, girls learned basic knowledge from their parents and family members at home. The instruction was directed toward character education, basic mathematics and Thai language.

After 1868, a number of treaties were concluded with foreign powers, mostly in the form of a Treaty of Friendship and Commerce (Ministry of Education, 2000). Since English became the lingua franca of the Far East, King Rama IV realized that the education provided by the monastery and the court was not adequate for future government officials. For this reason, King Rama IV commanded that measures be taken to modernize the education of the country. A good knowledge of English would form a part of the new educational requirements, as it had become a necessary key to further knowledge as well as a medium of communication with foreigners. Since then, formal education, which included early childhood education, has been established.

In 1890, the first child care center was established by Queen Saisawareepirom and was directed by Prince Dumrongrachanuparp. Prince Dumrongrachanuparp indicated that the first child care center to prepare young children to write legibly, to calculate and solve math problems, to behave appropriately, to cook, and to experience life skills (Ruamkid, 1996).

King Rama V (1868-1910) further pursued the policy of educational modernization. Recognizing the need for better-trained personnel in royal and governmental services, he opened a school in the palace to educate young princes and the

sons of nobles in 1871. This school was the first Thai school in the modern sense as it had its own school building, lay teachers and a schedule.

Thai education continued to be influenced by developments in Western educational systems. Two important contributors to Thai early childhood education were Friedrich Froebel and Maria Montessori. The Montessori and The Froebel methods were first introduced to Thailand in 1902 (Ruamkid, 1996). A number of private preschools were established. The Montessori and the Froebel teaching methods were applied in classrooms. Montessori believed that each child was unique and education should be individualized for each child. She recommended a prepared enriched environment in which children could do things by themselves (American Montessori Society, 1999). Friedrich Froebel believed that the educator's role was to observe the natural unfolding of children's development and to provide activities that would enable children to learn what they were ready to learn when they were ready to learn it (Smith, 1999).

Currently, Thai children who are ages 3-5 years may be enrolled in preschool programs. These programs are essentially designed to enhance social, physical, emotional, and intellectual skills prior to entering formal education. Early childhood education is not compulsory and is not a requirement for entering Thai primary schools. A large number of preschool programs are operated privately, without public funding or support. To date, there are many classrooms that offer the Montessori and the Froebel programs. Games and group activities dominate the preschool curriculum, with many outdoor activities being utilized to develop the pre-elementary child (Ministry of Education, 2000).

Thai demographics and educational history relate directly with the future education of Thai children. The program upon which the present study is based focuses upon the brain-based early childhood program and aims to prepare children for future roles as adults. The economic and social maturity of Thailand at the beginning of the next century will be dictated by the kind of educational preparation provided to the Thai children of today. At this time there may be some doubt that *Success For Life*, a neuroscience-based early childhood program which was established in Western culture, will align with the Thai culture and its public policy. The focus of this study is to establish whether or not the *Success For Life* program is compatible and adaptable to the Thai preschool curriculum, educational system, and culture.

Statement of Problem

Since 1997, Thailand has experienced an economic fiscal crisis (Royal Thai Government, 2000). The Thai National Education Development Plan has shifted toward addressing social issues that challenge the country's future, including changing cultural values, the breakup of families, and environmental degradation. In addition, consistent and continuing efforts have been made to mobilize related governmental organizations toward better integration and coordination to serve children and families during the last decade. The report from the United Nations Children's Fund (United Nations Children's Fund, 1997) noted that one of the responses from the Thai government to the national crisis was to determine basic needs and services for children and youth, and to expand "basic education" to cover preschool and primary school. The grade level for compulsory education was recently increased from six to nine years. That is, every child must

complete school to at least grade nine. Existing schools are being expanded, and schools which have not been used to full capacity due to decreases in enrollment as a result of demographic changes will be converted in order to serve older grades. Current and surplus primary school teachers will be trained through the Teacher Training Institute. Furthermore, subsidies will reduce costs for poor rural families and flexible curricula and schedules will be introduced (United Nations Children's Fund, 1997).

As a response to the increasing need to develop education for young children, organizations, such as United Nations Children's Fund (UNICEF), Mahidol University, Ministry of Public Health, Ministry of Education, and Community Development Department designed Integrated Family-Based Early Childhood Education (IFBECD) to link the various services related to children's health, with those related to education (United Nations Children's Fund, 1997). More programs to provide better education and improve the lives of young children need to be done. These programs should be based on the findings that investments made in the early years have a significant impact on later life success (Office of the National Economic and Social Development Board, 1997). The *Success For Life* program is introduced in Thailand in order to prepare young children to succeed in school and life. This present study examines whether the *Success For Life* program, which was successfully implemented in the United States, is appropriate to use in Thailand, where the public policy, educational system, and culture are unique.

Purpose of the study

Success For Life applies the latest brain findings to early childhood classrooms. The primary purpose of the present study was to determine if implementing *Success For*

Life in Thailand would be appropriate to Thai public policy, the Thai educational system, Thai culture, and to determine what changes may be necessary for its successful implementation.

Research Questions

This study assessed the effectiveness of implementing *Success For Life* in Thailand by answering the following research questions:

1. To what extent does *Success For Life* apply to the preschool level in Thailand?
2. To what extent does *Success For Life* align with public policy in Thailand?
3. To what extent does *Success For Life* conform to the Thai culture?
4. What changes to *Success For Life* are necessary to align with Thai educational system and culture?
5. What components are necessary to develop a model and process for electronic mentoring of teachers involved in *Success For Life* in Thailand?

Definition of Terms

The following terms are defined for purposes of explaining of usage in the study. Other terms or phrases are considered to be self-explanatory.

1. Audit Trail - A record of the procedures selected, the decision path followed, and sources of evidence used in qualitative research. Also used with computer data searching to record the path traveled to reach the finding (Anderson & Arsenault, 1998).
2. Brain-based learning - Theory of how people learn based on current research in the cognitive and neurosciences (Caine & Caine, 1997).

3. Child-centered approach - The process that allows learners to participate in identification of objectives, activities and learning methods (Office of National Education Commission, 2000).
4. Critical Periods (Window of Opportunity or Sensitive Period) - Periods in the growth of the organisms during which specific biological or environmental events must occur for development to proceed normally (Cole & Cole, 1993).
5. Developmentally Appropriate Practices - The outcome of a process of teacher decision making that draws on at least three critical interrelated bodies of knowledge, including (1) what teachers know about how children develop and learn (2) what teachers know about the individual children in their group; and (3) knowledge of the social and cultural context in which those children live and learn (Bradekamp & Copple, 1997).
6. Early Childhood - Children from birth to age 8 (Morrison, 1998).
7. Early childhood professional – In this study, early childhood professional was used to identify the person who is an expert in the area of early childhood
8. Enriched environment – A living surroundings that includes a source of emotional support, provides a nutritious diet, stimulates all senses, has the atmosphere that free of stress and depression, stimulates development, and allows the children or persons in the environment to choose their own activities (Diamond & Hopson, 1998).
9. EnVision – A two way audio-visual desktop interactive systems which utilize internet link (Tyler-Wood, 2001).

10. Halo Effect - The tendency to be influenced by one's general evaluation of the other individual on one striking dimension and to attribute to him or her, perhaps unfairly, other characteristics arising from the evaluation of that dimension (Verma & Mallick, 1999).
11. Hawthorn Effect - An obvious and observable change in a respondent's behavior based on the fact that a researcher is present, or the individual is knowingly participating in a research activity (Verma & Mallick, 1999).
12. Infinity walk – A promising solution to blocked learning and performance for many adults and children (Sunbeck, 1996).
13. Life condition - Characteristics of people that identify their status in regard to gender, age, place of residence, vocation, income, education, religious affiliation, ethnic background, and the like (Thomas, 1998).
14. Magnetic Resonance Imaging (MRI) - A medical technology that produces computerized images of tissues and organs using magnetic energy (Shore, 1997).
15. Neuroscience - The study of the human nervous system, the brain, and the biological basis of consciousness, perception, memory, and learning, and the biology of the nervous system, especially as related to behavior and learning (Zigmond, 1999).
16. Positron Emission Tomography (PET) - A technique that measures the activity of cells in different areas of the brain (Kotulak, 1997).
17. Preschool owner – A person who owns a preschool and has educational background in early childhood education or holds the certificates in the field of education.
18. Qualitative Research - A philosophy technique that stresses a phenomenological

model in which multiple realities are rooted in the subjects' perceptions (McMillan, 2000).

19. Questionnaire - Any data collecting instrument other than an achievement or ability test, where respondents directly supply their own answers to a set of questions (Vockell & Asher, 1995).
20. Reliability - The extent to which a test or technique functions consistently and accurately by yielding the same results (Verma & Mallick, 1999).
21. Teachers – Professional personnel with major responsibilities for learning and teaching and encouragement of learning among learners through various methods in both state and private educational institutions.
22. Teacher-centered approach - Students do not make choices regarding learning and do not have opportunities to explore learning through various learning styles (Brown, 2001).
23. Teacher-directed-child-centered approach - The process that teacher initiated instruction, along with child centered activities provide children the opportunities to expand language and begin problem solving (Brown, 2001).
24. Texas Essentials of Knowledge and Skills (TEKS)- The core outcomes for curriculum that all Texas schools use (Texas Education Agency, 1999).
25. Validity - The degree to which a test, tool or technique measures what it is supposed to measure (Verma & Mallick, 1999).

26. Videoconferencing - A method of electric communication that permits interactive exchange between two or more persons through their clients or terminals (Hussain, & Hussain, 1997).

Limitations of the Study

There were two limitations of the study. First, the eight sites that collaborated in the study did so on a voluntary basis. Thus, the samples were not necessarily representative of all early childhood programs in Thailand. Second, the school academic year in Thailand consists of two semesters. The first semester runs from June to September and the second semester runs from October to March. Consequently, the time frame that the researcher could collect data was from December 2000 – March 2001. The data collection period was 18 weeks.

Summary

The Thai economic, cultural, and social crisis has caused all concerned to realize the reform for the Thai education. One of the urgent needs is provide better education and improve the lives of young children. The *Success For Life* program was introduced in Thailand in order to prepare young Thai children to succeed in school and life. This study examines whether *Success For Life* would be appropriate to Thai public policy, Thai educational system, and Thai culture.

CHAPTER II

REVIEW LITERATURE

The primary purpose of the present study was to explore the effectiveness of implementing *Success For Life* in Thailand. The relevant literature is provided as a theoretical framework for the current research. This review addresses:

- 1) A summary of brain research highlighting importance of enriched environment and early experiences
- 2) A discussion of early childhood programs in Thailand
- 3) A discussion of the Thai Educational Act B.E. 2542 (1999) and the child-centered approach
- 4) A discussion of the Thai culture
- 5) A discussion of video conferencing
- 6) A discussion of the mentoring of teachers
- 7) An address of the translation

Importance of Enriched Environment and Early Experiences

Enriched environment was defined as the living surroundings that provide appropriate stimulating experiences that increased capacity to develop full potential and is set on the path of lifelong learning (Diamond & Hopson, 1998). The elements of the enriched environment include a source of emotion support, provides a nutritious diet, stimulates all senses, has the atmosphere that free of stress and depression, stimulates development, and allows the children or persons in the environment to choose their own

activities (Diamond & Hopson, 1998). New studies on brain and neuroscience have implications on the area of early childhood education (Sylwester, 1995). Research confirms that infants' sensory experiences and social interactions with supportive adults stimulate their cognitive abilities (Ramey & Ramey, 1999). Skilled caregivers offer children's experiences that support initiative, creativity, autonomy, and self-esteem (Bradekamp & Copple, 1997). In addition, touching babies can help to stimulate and quiet them and to stimulate developments. Tiffany Field of the University of Miami showed that early infant massage is associated with positive mood and healthy weight gain (Field, 2000). Moreover, neuroscience research findings suggest that good parental care, warm and loving attachments and positive age-appropriate stimulation from birth onward make a difference in the overall lifetime development of children (Newberger & White, 1989). A study by Honig (1998) shows that babies who can attach to a nurturing caregiver the first few years of life gradually gain confidence. Susan Landry, Professor of Pediatrics at University of Texas Medical School at Houston, adds that a strong and secure connection between caregivers and young children strengthens them to withstand the ordinary stresses of daily life (Landry, 1999). Landry (1999) also documented that parenting skills influence a child's abilities, particularly the abilities that are predictive of academic readiness. Permanent separation is related to stress and social development for later life (Ramey & Ramey, 1999). Research conclusively supports the importance of a nurturing environment in which young children can form healthy attachments with the caregivers.

Given the strong link between environment and early learning, studies reveal that children need an environment in which they can bond to the caregiver. Shore (1997) confirmed that babies' early attachments had a great impact on their emotional development, learning abilities, and capacities to function well later in life. In addition, Benasich and Brooks-Gunn (1996) reported that maternal knowledge about concepts of child rearing and the qualities of the home environment had a direct bearing on a child's development. Craig Ramey of the University of Alabama reached the same conclusion in his studies. In cases in which the mother has poor parenting skills, intervention is important in modifying a negative environment. He said that "early intervention appears to have had a particularly powerful preventive effect on children whose mothers had low IQs-while also benefiting other children from economically, socially, or educationally disadvantaged background" (as cited in Kotulak, 1997). Research conclusively supports the importance of a nurturing environment in which young children can form healthy attachments with the caregivers.

Children experience language since the time when they are born. Research indicates that children learn language from people and sounds around them (Ramey & Ramey, 1999). Kuhl (1999) emphasized the critical importance of providing a language- and experience-rich environment to babies starting in the first months and years of life. Auditory stimuli through word use in a particular language stimulate the formation of nerve connections. Cowley (1997) added that babies who hear additional words would understand more words and perhaps start to speak sooner. Like Cowley, Huttenlocher (1998), reported that children's language development was related to the speech they

heard at home and school. Ramey added in the *Governor's and First Lady's Policy Conference on Early Childhood Development and Brain Research* that research on language development showed that the exchange between mothers and infants between 15 and 26 months of age was particularly important for later reading skills and general academic performance and how greater interaction results in greater vocabulary during the early years (Ramey, 1999). Finally, Susan Neuman, Professor at Department of Curriculum, Instruction, and Technology in Education Coordinator of the Reading and Language Arts Graduate Program, Temple University, concluded that the need for early childhood education programs emphasized vocabulary development, letter knowledge and phonological awareness so that children developed skills predictive of later academic success (Neuman, 1999).

Furthermore, music provision to young children is critical. Findings showed that music improved reading abilities and linguistic skills (Rideout & Taylor, 1997). Music enhances spatial-temporal reasoning, which are essential to learning subjects such as math and science (Shaw, 2000). The infamous 'Mozart Effect' stemmed from research by Rauscher and Shaw (1998). The finding suggests that classical music improves spatial and abstract reasoning skills. Children who receive music training which is given by song and acting out movements show the greatest improvement in both learning about body parts and tests of creativity (Mohanty & Hejmadi 1992). In addition, music instruction during the preschool years promotes more efficient thinking processes during cognitive tasks (Flohr et al., 1996). Music is suggested to help children express their emotions and increase bonding and social interactions, thereby providing health benefits such as

increased immune system functioning and a more optimistic outlook on life. Music offers a particularly creative and enjoyable avenue for enriching the child's learning environment (Atkins, 1999). Atkins emphasized that music helps children express and regulate their emotions, increases reasoning skills, develops positive personality characteristics and optimistic attitudes, and increases social interactions, all of which promotes health and well-being. Thus, improvement in cognitive abilities can result from a variety of music training experiences.

Studies confirmed that providing an enriched environment to preschool children was critical to their developments. Ridley et al. (2000) noted that preschool and childcare quality are related to the child's progress in meeting developmental milestones. The National Association of Education for Young Children (National Association of Education for Young Children, 1999) added that high quality programs were programs that provided sufficient numbers of adults with specialized training in early childhood development. High quality programs provide activities that stimulate children's cognitive development, social and emotional development, and physical development. Children are happy, relaxed, and comfortable when they are involved in high quality programs.

In summary, discoveries confirmed that children's enriched environmental input stimulated active learning (Diamond & Hopson, 1999). The importance of the caregiver's role in early brain development does not end with early childhood. Families and caregivers provide many forms of stimulation to the developing brain through opportunities for intellectual challenge, exposure to new learning experiences, guidance in developing self-regulatory skills, and opportunities for personal decision-making that

stimulate brain growth in later of life. The consequences of stimulation and active involvement between caregivers and children help young children reach their fullest and healthiest development.

Thai Educational History

Modern Thai education can be traced back to the reigns of King Mongkut (1851-1868) and King Rama V (Chulalongkorn) (1868-1910). Both of these royal leaders tried to westernize the country. King Rama V brought reforms to Thailand in response to threats he foresaw from the advances of Western colonization into the Far East. Both of the Kings wisely assumed that if Thailand was to survive these threats, Thais had to learn to live with the ways of the Western cultures (Thailand Travel, 2000). This was the compelling rationale for reforms in the education structure which were initiated during both of their reigns.

For well over eight centuries, Thai education was based on Buddhist teachings, which in very early times was the major force in shaping the life and values of the Thai people. The Buddhist teachings were characterized as having programs directed toward two goals; namely, education for the masses and education for the monks. The education for the masses provided children with instruction which was primarily directed toward basic mathematics and the Thai and Chinese languages. Codes of conduct, which were based upon the Buddhist teachings, became an important part of the education of youth. As young men came of age, they entered the monkhood and devoted at least three months of their lives in the monastery studying in depth the teachings of Buddhism. Following that, they returned to their homes, where many of them became leaders of their families. A

few of the academically capable young men were recruited into government service, while others followed the trades of their fathers. Girls, who were taught Buddhist codes of conduct, had little chance to pursue formal learning, but were instructed at home on how to be good mothers and family members.

King Mongkut began the modernization of education in Thailand when he foresaw the growth of the western powers in the world. It was during his period that the first printing press was built in Thailand and that the education patterns of young children were restructured to fit the needs of the country. Knowledge of the English language became necessary to the royal family and this trend set the stage for the teaching of English to all children at a later time in history. King Rama V continued this practice and expanded the instruction of English to commoners and royalty alike.

The reign of King Rama V brought many important changes to the Thai society. The Department of Education was established in 1887, with the full responsibility of education and religious affairs for all of Thailand placed in its jurisdiction. At that time, more emphasis was put on literacy, citizenship, and a better standard of living. The King Rama V spent several months during 1897 visiting the educational systems of Western and Central Europe, observing those aspects of systems which showed promise for adaptation into the Thai culture. The resulting plan included education for all Thai youth, including young men and women. Its objectives specified that all children be able to read and write, do arithmetic, support one's self, and to have proper conduct. During King Rama V reign, his efforts resulted in the creation of primary and secondary education programs, all located within the confines of Buddhist monasteries. Under King Rama V's

plan, all Buddhist monks were assigned the task of teaching and training young students with Buddhist codes of conduct and, at the same time, they learned the elements of the Western culture. This pattern of education continued throughout the reign's of King Rama VI (1910-1925), when, in 1921, compulsory education became law and all children between the ages of seven and fourteen years were required to attend primary school for at least four (4) years. In 1916, King Rama VI established the first university in honor of his father. Chulalongkorn University first offered diploma-level courses in medicine, law, political science, engineering, arts, and science. Bachelor's degrees were given for the first time in 1928 (Chulalongkorn University, 1996). During ensuing years, institutions of higher learning were inaugurated at Thammasart, Kasetsart, Silapakorn, Mahidol, KhonKaen, Chiangmai, Songkhla Nakin, and Srinadarinwirot. Private sector participation in national education was first initiated in 1918 with the passage of the Private School Act. A few years later, in 1921, the Compulsory Primary Education Act was made law. The compulsory act guidelines and mandates have been modified several times since the 1921 Act was sanctioned. The latest revision in the law was made in 1999.

The government and private organizations that are involved in the development and implementation of education include the Ministry of Education (MOE), the National Education Commission (NEC), and the Ministry of University Affairs (MUA). They are entrusted with planning, administering, and coordinating the national education. Almost all formal and non-formal education is under the jurisdiction of the Ministry of Education. The Office of the National Primary Education Commission handles the largest

percentage (63.5%) of students in the overall education system (Mahidol University, 2000). The remainders are the responsibility of the Private Education Commission (PEC) and the Department of General Education.

Special education refers to the provision of education for all kinds of disabled and handicapped children, including the deaf, the blind, and the mentally retarded, while welfare education caters to the culturally and socially handicapped, such as hilltribe children, slum children, and children of lepers. To ensure that such children receive an equal opportunity in education, and education suitable for their abilities, special schools and welfare schools equipped with special educational programs and facilities have been established throughout the country. There are three themes of school reforms in special education. First, schools provide for students with each type of disabilities. Schools of this type serve children with special needs from preschool ages to grade 9 and use the curriculum designated by the Ministry of Education. Second, inclusion, children with special needs study in the regular classrooms. Third, public and private organizations provide non-formal education and train the disabilities to work by teachers and volunteers based on their needs and their capabilities (Royal Thai Government, 1995).

The necessity to adapt the educational system to the development and labor needs of the country, vocational educational and training has been given much promotion. Various types of courses and training programs are offered and administered by the Department of Vocational Education and the Institute of Technology and Vocational Education. The vocational education is offered to students who have completed the lower secondary level or to holders of Higher Certificates in Technical Education with high

academic records and a desire to become technical teachers in colleges and vocational training centers. In the 1960's a larger number of teacher training institutions were established to meet an urgent demand for more teachers. This expansion was precipitated by three major factors: the extension of compulsory education, population growth, and the availability of secondary education to a larger population. The attention that has been paid to expanding teacher education was evident in the dramatic increase in teachers. However, this effort was concentrated on the quantitative rather than on the qualitative. At present there is concern about improving the quality of the teacher education programs (Assumption University, 2000).

At all levels of education, arts and culture subjects that emphasize Thai language, civics, appreciation of Thai arts and culture, development of good working habits, development of artistic traits, and skills in artistic expression are included in the school curriculum (Office of the National Culture Commission, 2000a).

The National Education Act B. E. 2542 (1999)

Recognizing the urgent need for education reform, the government, acting through the Office of the National Education Commission (ONEC) under the Prime Minister's Office, has formulated policies and plans to bring about necessary changes within the Thai system. The ONEC also prepared legal provisions on education for consideration of the Constitution Drafting Council with the result that the 1997 Thai Constitution contains extensive provision on education, including equal rights for 12-year basic education with quality and free of charge, promotion of local wisdom and national arts and culture, and development of the teaching profession.

Thai Educational system provides six (6) years at the primary level, three (3) years at the lower secondary level, three (3) years at the upper secondary level, and four (4) years at the tertiary level. Although only six (6) years of primary schooling are now compulsory, a project to widen access to lower secondary level has been actively implemented nationwide through a special Cabinet approval since 1987 (Office of the National Education Commission, 1999). The widening access is the first step towards an eventual goal of nine-year compulsory education.

The National Education Act (1999) addressed Thai basic education in providing for the 12 years before higher education. In addition, compulsory education would be for nine years, requiring children aged seven to enroll in basic education institutions until the age of 16, with the exception of those who have already completed grade 9. Students are categorized into two major groups: children in the nine-year compulsory educational system, and home school children-parents educate their children themselves at home or coordinate with the school to provide them with education. Home school parents may teach their children until grade 12, but the students are required to be evaluated by a committee to be set up under the law.

In August 1997, the ONEC drafted the National Education Act that sets out to decentralize finance and administration, giving individual teachers and institutions more freedom to set curricula and mobilize resources, which in turn will tend to increase accountability and ensure that funds are targeted in the right areas. The objectives of the Act are to ensure that education aims at the full development of the people in all aspects - physical and mental health, intellect; knowledge; morality; integrity; and the pursuit of a

desirable lifestyle in accordance with society and in harmony with other people (Office of the National Education Commission, 1999).

According to the Act, the provision of education is based upon the principles of a lifelong education for all; the participation of all segments of society in educational provision; and continuous development of the bodies of knowledge and learning processes. All learners are capable of learning and self-development, and are regarded as being most important. The teaching-learning process aims at enabling the learners to develop themselves at their own pace and to the best of their potentiality. The Act states that, in education approaches shall give emphases to knowledge, morality, learning process, and integration of the (1) knowledge about oneself and the relationship between oneself and society; (2) scientific and technological knowledge and skills; (3) knowledge about religion, art, culture, sports, Thai wisdom, social studies, health, and the application of wisdom; (4) knowledge and skills in mathematics and languages; and (5) knowledge and skills in pursuing one's career and capability of leading a happy life.

The National Education Act serves as master legislation on education of the country, leading to significant education reform, the major tasks of which are:

1) Learning reform which follows the guideline and spirit of the provisions in the Act by attaching highest importance to learners. Thai Ministry of Education indicated that "Thailand's major strengths- and weaknesses-in its educational system are its teachers. Teachers always serve as the torchbearers-to hand over knowledge and ideas to the community." The report showed that student achievements in mathematics and life experience at primary education level and for science at the second education level, is

below standard (Cabrera, 2000). The ONEC has conducted research and development on learner-centered teaching-learning process, allowing learners to develop at their own pace and in accord with their potential. Steps have been taken to identify model teachers who have accordingly been given their due honor and support. Results of the pilot projects implemented have been disseminated for nationwide multiplication in the future.

2) Reform of educational administrative structure. Steps are taken to adjust organizational structures in accord with provisions in the chapter on Educational Administration and Management; develop the teaching profession through reorganizing the systems for teachers, faculty staff and educational personnel; and reorganize the systems for efficient utilization of resources and investment for education. In this connection, an Education Reform Office is established and charged with the responsibilities of making proposals, including those on the drafting of necessary legislations for implementation of the above-mentioned activities.

3) Legal measures as stipulated in the Act, total 32 legislations and regulations needing preparation and/or amendment, with the following 10 requiring immediate action, namely:

3.1 Royal Decree on Establishment of the Education Reform Office;

3.2 Royal Decree on Establishment of Office of National Education Standards and Quality Assessment;

1. Ministerial Regulations on Education for the Disabled;

2. Ministerial Regulations on the Rights to Provide Basic Education;

3. Ministerial Regulations on Differentiation of Levels and Types of Basic Education;
4. Ministerial Regulations on Differentiation of Levels or Equivalency of Non-formal or Informal Education;
5. Ministerial Regulations on Criteria and Methods of Calculating Children Age for Compulsory Education;
6. Ministerial Regulations on Criteria and Conditions for Provision of Specialized Education;
7. Nine-year Compulsory Education Act; and
8. Vocational Education Act.

The National Education Act sets the foundation for reform efforts to prepare people for new social requirements. It encourages Thais to develop towards more analytical and independent thought. The knowledge-based and learning society helps find new solutions for the global era. The implementation of education reform requires strong leadership, integrated public vision and goals, and support from teachers, lecturers, parents, students and the public. It is essential that all Thais co-operate in undertaking these tasks and responsibilities to ensure sufficient qualified human resources for the ongoing development of Thailand. The Educational Reform brings Thai society to a new juncture that is crucial to improving the people's quality of life and to prepare Thai citizens to be ready for any kind of competition in the coming millennium. At that time, graduates will be required to be knowledgeable about technology and the skills which

will be required in order to gain employment (Office of the National Education Commission, 1999). Rung Kaewdang, secretary-general of the Office of the National Education Commission, added that education must aim at full development of students in all aspects-physical and mental health, intellect, knowledge, morality, and integrity. Therefore, children can lead a desirable way of life and live in harmony with other people. Kaewdang further indicated that Thai educational system had long emphasized rote learning, with teachers serving as the center of teaching and learning activities. Students suffer from the classroom-study competition (Vanichbutr, 2000).

4) There will be a system of educational quality assurance-conducted by the schools themselves and by outsiders- to ensure improvement of educational quality and standards at all levels. Rung Kaewdang added that an Office for National Educational Standard and Quality Assessment would be established as a public organization responsible for developing criteria and methods of external evaluation, and conducting evaluation of educational achievements to assess the quality of institutions (Vanichbutr, 2000).

5) Teachers, Faculty Staff and Educational Personnel State and private teachers and educational administrators must have professional licenses by 2002. A law will be enacted to set the criteria and procedures for the issue and withdrawal of licenses. In addition, Kaewdang suggested a four-step plan, aimed to solve the problem of teacher deficiency, including recruitment, training, improvement of salaries, welfare and other benefits, as well as rewards for outstanding teachers (Vanichbutr, 2000). A Fund for

Promotion and Development of Teachers, Faculty Staff and Educational Personnel will be set up as stipulated in ministerial regulations, will be effective by 2002.

6) The State is responsible for distributing frequencies, signal transmission devices and other infrastructure necessary for radio broadcasting, television, radio and other mass media for use in the provision of formal, non-formal and informal education, and enhancement of religious, artistic and cultural affairs.

7) Individuals, families, communities, local administration organizations, private organizations, professional bodies, religious institutions and other social institutions will mobilize resources for education, donate properties and other resources to educational institutions, and share educational expenditures as appropriate and necessary.

Child-centered approach

According to the Office of National Education Commission (Office of National Education Commission, 2000), learning process through involves identification of objectives, contents, activities, learning sources, instructional media, and evaluation aimed at development of the persons and the enrichment of their “lives.” Therefore, learners should be allowed learning experiences to their highest potential and in line with their aptitude, interests, and needs.

In organizing learning activities, regard should be given to individual differences. Learners should be enabled to come in touch and interact with all around them. Students should be allowed to investigate, experiment and exchange views with others until lesson contents are crystallized. They should also be familiar with critical thinking, able to use their own imagination and express themselves clearly and logically.

The teachers' roles are confined to motivation and providing support in all activities until the learners can, on their own, find answers and solutions to problems. Children are encouraged to collaborate work in a team. Teachers should organize activities aimed at inculcation of integrity, discipline and responsibility for work. Learners should be trained in self-evaluation and self-improvement, acceptance of others and good citizenship at national and global levels. The child-centered approach allows learners to participate in identification of objectives, activities and learning methods. They are able to think, do and learn themselves as well as take part in evaluation of learning development in accord with their potential, needs, interests and aptitude. Teachers are responsible for initial planning relating to both contents and methods for learners; provide an ambiance conducive to learning; and suggest guidelines for seeking appropriate knowledge to individual learners.

Early Childhood Education in Thailand

Early childhood education is provided in several institutions, namely: child care centers; child development centers, pre-school child development centers for religious institutions; initial care centers for disabled children or those with special needs, and early childhood development centers under other names. Thailand's children who are ages 3-5 years may be enrolled in pre-school (pre-primary) education programs, which are essentially designed to enhance social, physical, emotional, and intellectual skills prior to entering formal education. Early childhood education is not compulsory and is not a requirement for entering Thai primary schools (Ministry of Education, 2000). A large number of pre-primary programs are operated privately, without public funding or

support. Games and group activities dominate the pre-school curriculum, with many outdoor kinds of activities being utilized to develop the pre-elementary child. Children ordinarily enter primary education following the pre-primary phase. The public schools have no tuition fees, but children are asked to purchase their own textbooks and to pay the costs of certain extracurricular activities. Traditionally, the curriculum has consisted of mathematics, science, Thai language, civic and ethics, social studies, and physical activities. Although the Thai educational system appears very much like that of Western countries in terms of structure, content, and grading, it places much emphasis on the retention of Thai social values, religion, and culture (Tongsopit, 1990).

Thai culture

The Thai cultures as expressed in her religion, arts and literature, and social way of life, reveal a unity in a general sense with her neighbors, the Cambodians, the Mons, the Laos and partly the Malays, but with varied characteristics. The cultures of the races are a homogeneous whole with local diversities and details thrown in (Office of the National Culture Commission, 2000). Fundamentally, the culture of Thailand is based on its religion (Office of the National Culture Commission, 2000a). That is, arts and literature, social system, habits and customs are developed and clustered around her religion. Presently, there are some changes in the culture due to western influence. However, religious culture is still the dominant living force to the Thais.

The culture of Thailand is midway between the two great cultural systems of Asia, China on the one side and India on the other. Chinese culture did not penetrate further west beyond Annam; nor did Indian culture go further north than to the Indo-

Chinese Peninsula. They came to a halt at one another's bulwarks and did not penetrate further. Due to the nature of the country and to other facts peculiar to the north of the Peninsula, Chinese culture did not penetrate far from lack of easy communications. Thai adopted Chinese cultures from Southern China and adapted it to be suitable to the tropical surroundings, developing them independently (Mahidol University, 2000a).

Thai adopted Buddhism from both China (Mahayana Buddhists) and India (Theravada Buddhists). Therefore, Thailand formed the meeting place of the two great cultural systems which came to a halt and fused into a new one with double layers of culture. Both Mahayana and Theravada Buddhism teach that the younger must pay respect to the seniors. Consequently, young Thai children are taught respect for elders. By the time children walk they are aware of their position in the family hierarchy, a distinction that applies not only to the relationship between parents and children, but also to that between siblings of different ages. This same delineation of roles applies to the wider world outside the family and will remain deeply ingrained throughout life. Thus, younger Thais are reluctant to oppose or otherwise confront seniors during their subsequent careers in business.

Parents and teachers teach children a sense of responsibility at an early age. Each child is assigned certain duties according to age and ability. For example, children are assigned to take care of younger brothers and sisters while parents are at work. As they grow older, responsibilities increase and they are allowed to participate in family discussions, with their opinions taken into account when important decisions are made. One of the most important responsibilities placed on children is that of taking care of

parents in their old ages. There is no feeling of being inconvenienced by this duty of caring for aged parents; on the contrary, their acquired wisdom gives them an honored place in the household, and their counsel is actively sought in teaching their grandchildren and great-grandchildren to be responsible adults with the same traditional values.

Buddhist teachings are at the root of the typical Thais' sincere consideration for others, a concept encompassing spontaneous warmth and compassion that allows families to make anonymous sacrifices for friends and to extend hospitality to strangers. For example, strangers visiting a house will rarely be seen as intruders and subjects for suspicion and distrust. Instead, Thais will feed them and generally treat them as friends. Although highly individualistic and resisting regimentation, Thais nevertheless realize that inner freedom is best preserved in an emotionally and physically stable environment. Therefore, they believe that social harmony is best maintained by avoiding any unnecessary friction in their contacts with others. This strong Thai feeling shows an extreme reluctance to impose on anyone or disturb his personal equilibrium by direct criticism, challenge, or confrontation. In general, people will do their utmost to avoid personal conflict.

Festivals, cultural activities, and religion holidays in Thailand take place all year. The rice-planting season usually begins in April or May. Rice is the most important of all Thai crops and the principal food for people throughout the country. Visakha Bucha, the year's greatest religious holiday, commemorates the Buddha's birth, enlightenment, and death. Thais attend temple celebrations and sermons during the day. Those who cannot

attend the activities during day join the solemn candle or torch lit procession that circumambulates the monastery chapel three times. Each person carries flowers, three glowing incense sticks, and a lighted candle in silent homage to the Buddha, his teaching, and his disciples.

During the period of three months from June to October (Pansa in Thai), Buddhist monks are required to remain in their monasteries overnight, a tradition which predates Buddhism. In ancient India, all holy men, mendicants and sages spent three months of the rainy season in permanent dwellings, thus avoiding unnecessary travel during the period when crops were still new for fear they might accidentally tread on young plants. In deference to popular opinion, the Buddha decreed that his followers should also abide by this tradition. This initiated a move away from an itinerant life to a more or less settled existence since the advantages of communal living became apparent. Pansa represents a time of renewed spiritual vigor. The monk meditates more, studies more, and teaches more at the temple. Pansa is also ordinarily the season for temporary ordinations. Young men enter the monkhood for spiritual training, to gain merit for themselves and their parents, and to conform to the widespread feeling that a man who has not been a monk cannot be considered a mature adult. The Buddhist ordination is a mixture of religious solemnity, merit-making, and boisterous celebration reflecting the Thai belief that the three most important events in a man's life are his birth, his ordination, and his marriage.

In early November, Loy Kratong festival takes place. Loy means "to float," and a kratong is a lotus-shaped vessel traditionally made of banana leaves. The kratong usually contains a candle, three incense sticks, some flowers, and coins. By the light of the full

moon, people light the candles and incense, make a wish, and launch their kratongs on the nearest body of water. The Goddess of the Water, who plays such an important role in rural life, is thus honored, and it is commonly believed that the kratongs carry away the past year's sins as well as the hopes of the launch for the future. During Loy Kratong, Moonlit waterways throughout Thailand are covered with tiny, flickering lights representing millions of silent aspirations.

Thais celebrate Songkran festival, which is the traditional Thai New Year, on April 13. Songkran activities include a house cleaning, sprinkling of Buddha images with water, memorial ceremonies, merit-making presentation of gifts to monks, elders, and spirits, the release of caged birds and fish, pilgrimages to holy shrines, parades, dancing, and uninhibited, good-natured water throwing.

Formerly everyday life was highly structured and circumscribed by Brahmanic ritualistic taboos, and some of these still remain in modern society. Wednesday, for example, was considered an inappropriate day on which to cut hair and accordingly, some barbershops close each Wednesday. Astrology also retains its ancient influence and is used by many people to determine auspicious dates for major undertakings. Buddhist monks, Brahmins, and professional astrologers cast horoscopes according to which hour to embark on a trip are decided. Purchasing land, starting a new business, or opening a shop are often subject to an astrologer's calculations, and few couples would agree to be married without first determining the suitability of their union and the most auspicious day and minute for the ceremony.

However, despite all the apparent changes traditional Thai values are still strong beneath the surface of urban life, a reflection, no doubt, of the fact that the overwhelming majority of city dwellers have come from village backgrounds and the potent strength of Thai cultural heritage, which over the centuries has so often demonstrated its ability to bend without breaking.

Video Conferencing: Mentoring Through Electronic Communication

Computer and technology communications have been growing explosively and have become essential parts of the Thai infrastructure (Comer, 1999). The growth in networking has had an educational impact. Schools, at all grade levels, use computer communication to provide teachers and students with instantaneous access to information in on-line libraries around the world. In addition, messages can be easily composed and transmitted and can obviate face-to-face meetings in faculty offices. Experts from afar can be drawn into virtual classrooms to stimulate deeper learning from extended interaction. As a result, cross-cultural experiences can be shared in real or simulated encounters with foreign colleagues.

Several technology methods, such as electronic mail (e-mail), electronic file transfer (ftp), voice mail (v-mail), and facsimile (fax), allow messaging to accommodate time zone differences, while others such as conventional telephone, computer chat modes, and video conferencing required simultaneous availability of people at terminals. Video conferencing is another method of electronic communication that allows interactive exchange between two or more people at a distance in terms of three major types, including audio, video, and computer (Hussain & Hussain, 1997). Video

conferencing enables the extension of educational opportunities to distant locations, the accommodation of a variety classes from college classes to public services programs, and a flexible format for meetings (Envision Presentations, 1999). In addition, the video conferencing extends organizational and cross-organizational meetings, counseling, foreign language and cultural exchanges (Video Conferencing Cookbook, 2000). Developments in instructional and learning technology, when combined with information technology and telecommunications, provide new forms and new capabilities for learning.

The use of video conferencing technology has the potential of increasing productivity and efficiency by reducing unproductive travel time, preventing meeting delays, creating shorter and more structured meetings, and allowing greater participation and greater teamwork. Furthermore, course activities, projects, and curriculum content can be designed and facilitated through the medium provided by video conferencing technology. As a result of the increasing power and complexity of communication and computer technologies, teaching and learning has expanded beyond the traditional classroom (Bailey & Cotlar, 1994). For example, mentors can guide teaching strategies to the teachers from the universities or stations. The role of mentor and coach is greatly enhanced via electronic communications (Comer, 1999). The flexibility and accessibility through e-mail and video conferencing systems permit individuals the freedom to interact at their convenience and pace. In addition, the video conferencing users located remotely from one another may successfully explore, experience, and better understand each other.

Mentoring Teachers

Mentoring has become increasingly important as a mode of professional development in education (Fielding, 1999). Its underlying assumption is that a more experienced teacher can facilitate the professional development of a new colleague or a less experienced teacher to a particular stage in a career. Mentoring is defined as a professional practice that occurs in the context of teaching whenever an experienced teacher supports, challenges, and guides novice teachers in their teaching practice (Odell & Huling, 2000). McIntyre and Hagger (1996) added that mentoring was a multi-faceted concept incorporating personal support and the more rigorous notion of professional development leading to enhance competence. Mentoring requires a commitment to actively exert a consistent influence on the professional development of a protégé to the extent that necessary experiences are created and activities are promoted that will contribute to the positive growth and competence of the protégé. Mentors function as trusted colleagues, developers, symbolizers of experience, coaches or supervisor, and anthropologist for their protégé. Among the interventions that facilitate the development of novice teachers as they are learning to teach, the following appear to be especially crucial (Odell & Huling, 2000): quality preparation programs that incorporate a variety of teaching experiences in schools with mentors; reasonable assignments in school contexts that support and facilitate teacher growth; systematic induction that includes a variety of components especially the ongoing support and challenge of a well-prepared mentor who uses effective mentoring approaches; clearly communicated expectations about what constitutes quality teacher; and teacher-

assessment procedures and measures consistent with the developmental nature of learning to teach.

Odell and Huling (2000) indicated that the beginning teacher needs assistance in: reducing stress in the transition to becoming a teacher; learning how to apply theory and research about teaching and learning gained as a student in a teacher education program; and increasing the novice teacher's success and self-confidence. Induction is viewed as a period that provides for a supportive transition (Gold, 1996). Assistance induction programs help the new teacher bridge between: preservice teacher preparation and the often harsh reality of the school and classroom; the theoretical study of teaching, learning models, research, and the application of that knowledge in successful teaching practices that results in student learning; and the isolation often felt by beginning teachers from the existing veteran teaching staff. Another approach to induction programs involves the assessment of teaching knowledge and skills. This approach concentrates on assessment of new teachers in order to gather evidence of teaching, through methods, including observation, interview, and portfolios.

Another mode that mentor teachers help increasing teachers' professional development and experiences is providing professional training. Studies confirm that teacher training increases teacher performance, instructional practices, and student achievement (Forte, 2000). The curriculum of teacher training varies. People who work with or teach preschoolers should have specific training and/or certification for that age group (Morrison, 1998).

Translation

Translation is the expression in another language of what has been expressed in another source language, preserving semantic and stylistic equivalences (Bell, 1991).

Hickey (1998) noted that there were two aspects of translation: the notion of “translation” itself, and the significance of changes in context often involved in translation work.

Hickey (1998) continually indicated that communication requires encoding, transfer, decoding, and inference.

The translation is to reinstate in one language what someone else said or wrote in another language. The translator designs the translation in such a way that it is resembled closely enough in relevant respect (Hickey, 1998). The translator must understand and explore the socio-cultural, religious, scientific and political importance in the context (Wadensjo, 1998). In addition, Kiraly (1995) suggested that the translator should read attentively, reflect, imagine, compare, make global or local assessments beyond the immediate unit, and seek out the clues in an overall attempt to get the feel of the source text. Efficient accessing of glossaries, as well as the mental lexicon and dictionaries, plays a crucial role.

Hickey (1998) indicated that there were three aspects psychological equivalence, including functional, conceptual, and metric equivalencies, that should be considered when cross-cultural adaptation was necessary. First, functional equivalence existed when certain behaviors that the instrument attempted to represent function identically in all involved cultures (Butcher & Han, 1996). Second, conceptual equivalence presented when there were semantic similarities between the words. Translation and back to

translation had been adopted to ensure conceptual or linguistic equivalence of source or target language version (Hutlin, 1987). Thirdly, metric equivalence is acquired when the instrument is validly adapted. Various statistical analysis has been proposed to ensure metric equivalence, such as computation of intercorrelation among subcomponents examination of point-biserial correlations between item responses and the total scale score between the different language versions of the scale. Differences in item-total correlations are assumed to reflect psychometric differences introduced by the translation from the source to the target language.

Back translation is an essential technique of ensuring psychological equivalence between source and target language versions (Butcher & Han 1996). Back translation involves the process translating the translated target language version back to the source language by a bilingual person. The back-translated version is then compared with the original version in terms of general meaning of the sentences, complexity levels, forms, semantics, similarity of words and grammatical structures. Ahyoung and Eun-Young (1999) recommended that the back translation should be used in the cross-cultural test adaptation. In addition, the consistent superiority of the validation version in terms of its reliability, factor structure clarify, and item quality confirms the importance of a proper validation procedure.

Hamberton & Kanjee (1993) noted it was best to translate words and expressions with words and expressions with approximately the same frequencies in the two languages. However, the frequency lists of words and expressions are not always available. That is, the solutions that are possible should include: make no distinction

between the two different source languages and keep the entire text in the same target language; keep the transfer in the original source language; use a slang or colloquial form of the main target language; and find another language (Cincotta, 1996).

It is necessary that the translator understand the author's original text and thoroughly aware of the stylistic and literary devices which the author uses in order to achieve his desired effect. In addition, the translator should find a language which has the same classical language or descendent relationship to the target language. Cincotta (1996) indicated that if a word or a phrase was a well-known saying, then obviously it could not be translated, it must be transposed, the result often becoming unintentionally humorous.

Qualitative research method

Qualitative research was defined as a form of inquiry that explored phenomena in their natural settings and used multi-methods to interpret, understand, explain and bring meaning to them (Anderson & Arsenault, 1998). A focus on understanding and meaning is based on verbal narratives and observation rather than numbers. Qualitative research usually arises in naturally situations. The goal in qualitative research is to understand informants from their point of views (McMillan, 2000). As a result, much of what is reported in qualitative studies is participants' perspectives through conversation and observation in natural settings. Qualitative research methods fall into four classifications, including observation, interview, documents, and research instruments of various kinds such as questionnaires, surveys, and attitude. This study, the researcher discusses interview, observation, field notes, and questionnaires.

Interview

Qualitative researchers have many ways to obtain information. Interview is one of methods that qualitative researchers use. The interviews can be unscheduled, consisting of informal conversations with participants, or they can be scheduled with specific purpose. The purpose of the interview is to express and explain the participants' point of view, how the informants think and how they interpret and explain their behavior within a given setting. The interviewer should not indicate an approving or disapproving valuation. It is important to probe to obtain further, more detailed and relevant information (Vockell & Asher, 1995). Furthermore, researchers should avoid leading questions that unconsciously imply a specific answer (Best & Kahn, 1986).

McMillan (2000) indicated that there were three types of interview, including key informant interview, life-history interview, and focus group interview. Key informant interview is in-depth interviews with a few key participants, individuals who are particularly knowledgeable and articulate, will provide insights and understandings about the subject under investigation (Anderson & Arsenault, 1998). McMillan (2000) suggested that key informants should be selected after the researcher has become familiar with the setting to increase the probability that they will provide needed information truthfully.

The life history interview, the second type of interview, the researcher is interested in learning about the subject's life. The data from life histories are helpful in obtaining a historical perspective or a broad perspective on how an individual has developed.

The last interview technique, the focus group interview, is designed to promote interaction among the individuals and lead to a richer understanding of whatever is being studied. A moderator guides the discussion, based on a topic guide that has been prepared in advance. The focus group technique is most useful for encouraging subjects, through their interaction with one another, to offer insights and opinions about a concept, idea value, or other aspects of their lives about which they are knowledgeable.

The interview setting enables a researcher to clarify questions that informants may find confusing. With a skillful interviewer, the interview is often superior to other data-gathering methods (Best & Kahn, 1986). After the interviewer establishes a friendly and secure relationship with the informant, certain types of confidential information may be obtained. In addition, interview makes it easy for informants to amplify their answers or to digress from the central topic in ways that prove useful to the investigator. Interviews can also provide an in-depth understanding of a respondent's motives, pattern of reasoning, and emotional reactions not possible with questionnaires (Thomas, 1998).

In order to obtain reliable an object data, interviewers must be carefully trained. The training should include skills in developing rapport, asking probing questions, preparing for the interview, and a host of other details. Validity is greater when the interview is based on a carefully designed structure, thus ensuring that the significant information is elicited. Reliability may be evaluated by restating a question in slightly different form at a later time in the interview. Repeating the interview at another time may provide another estimate of the consistency of response (Best & Kahn, 1983).

Questionnaires

Questionnaire is a written document containing statements or questions that are used to obtain subject perceptions, attitudes, beliefs, values, perspectives, and other traits (McMillan, 2000). Questionnaires are used to obtain information about characteristics of people that identify their status in regard to gender, age, place of residence, vocation, income, education, religious affiliation, ethnic background, and the like. Such information is typically used by researchers to place respondents in categories that are easily compared, on the assumption that the categories may be associated with the study's target variables. Questionnaires are also used to obtain respondents' beliefs, attitudes and convictions about a topic (Thomas, 1998). Questionnaires are designed to reveal people's attitudes through the opinions they express. A researcher asks for opinions on the assumption that information about people's preferences can help explain and predict their behavior in decision-making situations. There are four types of questionnaires, including dual-choice, multiple-choice, short-answer, and narrative or essay.

First, dual choice items offer respondents two options from which to choose. Two advantages of the dual-choice questions are that the items can be quickly answered and the results easily compiled. A further advantage is generally the case with instruments that pose a greater number of potential answers to each item, as in multiple-choice items and in open-ended questions that require a narrative response.

Second, multiple-choice items. Multiple-choice items include discrete answers from which to select or as a dimension or scale extending from one extreme to the other. Discrete-answer type is best suited to situations in which the options are distinctly

different from each other rather than degrees of judgment along a single dimension.

However, frequently people's opinions are most accurately reported as positions along a dimension whose division represents sequential qualities, frequencies, or amounts. The choice alternatives can be represented as degrees along a scale line, as proportions, or as successive discrete items.

Third, short-answer items. Short-answer items require respondents to offer a word or phrase in reply to a question. One advantage of such item is that they do not restrict respondents' answers to a set of options presented by the researcher, but rather, they permit informants to reply in any way they wish.

Last, narrative or essay items. Some questions require replies in the form of extended description or explanations. Narrative or essay items require past experiences in respondents' lives or their predictions about the future (Thomas, 2000). As a result, narrative responses can reveal the unique patterning of different people's knowledge and attitudes.

Anderson and Arsenault (1998) noted that reliability was a concern when the questionnaire incorporates scales that were sensitive to the subject. Reliability of questionnaires may be inferred by a second administration of the instrument, comparing the responses with those of the first. Reliability may also be estimated by comparing responses of an alternate form with the original form. The validity of a questionnaire is asking the right questions, phrased in the least ambiguous way. In short, the item samples are significant aspect of the purpose of the investigation (Best & Kahn, 1986). The meaning of all terms must be clearly defined so that they have the same meaning to

all respondents (Anderson & Arsenault, 1998). Thomas (1998) also added that investigators sometimes used direct observation as the basis for judging how closely informants' behaviors matched their questionnaire answers.

Trustworthiness

Trustworthiness is a matter of concern to the consumer of the research who will use the study for thought or action. The probability that the findings and interpretations of a naturalistic study will be found to be credible depends on the inquirer's demonstrating a prolonged period of engagement, providing evidence of persistent observation, triangulating sources and methods, conducting extensive members checks, and guarding against both going native and premature closing (Erlandson & Harris, 1993). Guba and Lincoln (1985) suggested five techniques for establishing credible findings and interpretations, including prolonged engagement, persistent observation, and triangulation, peer debriefing, referential adequacy.

The first, prolonged engagement aims to learn the culture, testing for misinformation introduced by distortions either of the self or of the respondents, and building trust. Erlandson and Harris (1993) added that prolonged engagement developed rapport, built relationship between the researcher and the informant, and obtained wide scope of data and accurate data. It is imperative that the researcher spends enough time in becoming oriented to the situation to be certain that the context is thoroughly appreciated and understood (Guba & Lincoln, 1985). The period of prolonged engagement is intended to provide the investigator an opportunity to build trust.

The technique of persistent observation adds the dimension of salience to what might otherwise appear to be more than a mindless immersion. The purpose of the persistent observation is to identify those characteristics and elements in the situation that are most relevant to the problem or issue being pursued and focusing on them in detail. That is, if prolonged engagement provides scope, persistent observation provides depth.

The technique of triangulation is the third mode of improving the trustworthiness in findings and interpretations. Verma and Mallick (1999) defined triangulation as a process of corroborating judgments by drawing on evidence from different or multiple sources. The researcher should be sure to explore rival explanations and to determine the convergence (or nonconvergence) of data from multiple sources in terms of supporting causal inferences (Mertens, 1998).

Peer debriefing, the forth technique, is a process of engaging, with a disinterested peer, in extended and extensive discussions of one's findings, conclusions, tentative analyses, and, hypotheses (Mertens, 1998). The disinterested peer poses questions in order to help the evaluator understand his or her own posture and values and their role in the inquiry; to facilitate testing working hypotheses outside the context; and to provide an opportunity to search out and try next methodological steps in an emergent design.

Referential adequacy, the last technique, is a means for establishing the adequacy of critiques written for evaluation purposes under the connoisseurship model (Eisner, 1975). Video recordings and cinematography, he asserted, provide the means for "capturing and holding episodes of classroom life" that could later be examined at leisure and compared to the critiques that had been developed from all of the data collected. The

recorded materials provide a kind of benchmark against which later data analyses and interpretations could be tested for adequacy.

Content Analysis

A typical process of content analysis consists of five steps, including:

step 1 - stating the general question that the research project is intended to answer. The general question delineates the principal domain of communications that can profitably be analyzed; step 2) decomposing the general question into its constituent subquestions. The subquestions indicate the precise information to be sought in the process of inspecting documents and clarify the investigator's conception of which topics should make up the final research report; step 3) finding communications that will likely answer the subquestions; step 4) inspecting communications to locate passages pertinent to the subquestions; and step 5) recording and organizing the results of the inspection (Thomas, 1998).

Analytic Induction

Qualitative researchers usually start analysis with a form of analytic induction.

This strategy involves scanning the data for categories of phenomena and for relationships among such categories, developing working typologies and hypotheses on an examination of initial cases, and then modifying and refining them on the basis of subsequent cases (LeCompte & Preissle, 1993). Analytic induction is used exclusively in generative research. Although it has been used principally to construct concepts, ideas, and themes, it may be adapted for enumeration. In the early phases of analysis, it may be limited in those cases where the researcher uses the techniques to identify relationships

which obtain across many participants. The strategy is particularly useful because it does not require a particular kind of analytic unit (LeCompte & Preissle, 1993).

Constant Comparison

Glaser and Strauss (1967) suggested the constant comparison strategy that combines inductive category coding with a simultaneous comparison of all social incidents observed and coded. This means that as social phenomena are recorded and classified, they also are compared across categories. Thus the discovery of relationships, or hypothesis generation, begins with the analysis of initial observations, undergoes continuous refinement throughout the data collection and analysis process, and continuously feeds back into the process of category coding. As events are constantly compared with previous events, new typological dimensions as well as new relationships may be discovered.

The constant comparative method shares with analytic induction its focus on identifying categories and on generating statements of relationships. Glaser and Strauss (1967) described constant comparison as an inductive procedure, devised to assist in generating social theory. Although participant constructs may be used in its preliminary phases, the relationships so developed are defined objectively. Typically, the constant comparative method is used as a constructive rather than as an enumerative procedure. Like analytic induction, constant comparison technique is flexible; it does not require the use of any particular unit of analysis.

In summary, research reveals that much of a child's learning capacity is developed and formed during the earliest years from birth to age three. The findings

assert that good parental care, warm and loving attachments, and positive age-appropriate stimulation at birth all contribute to and have a lifetime impact on a child's development. The challenge to early childhood professionals is that the neuroscience findings must have some implications to approach education (Education Commission of the States, 1996). Educators and professionals have started to bridge the gap between the two disciplines (Newberger, 1997).

Success For Life, a brain-based early childhood program, was developed to enable children to successfully engage in processes of development during the critical years for learning from birth to age six. Research confirmed that *Success For Life* increased teachers' learning in the areas of brain development and children's growth and development. In addition, children in *Success For Life* classrooms have had indirect effects in positively influencing academic achievement and improving social relationships.

Currently, Thailand has experienced economic problems. Therefore, the Thai National Educational Development Plan that was released in 1999 concentrated on social, cultural, and educational issues. More programs, such as *Success For Life* to provide better education and to help children develop and learn to their full potential, need to be implemented, based on the findings that investments made in the early years have a significant impact on a child's future success.

Investigating the effectiveness of implementing *Success For Life* in Thailand may help to make *Success For Life* be more applicable to the preschool level in Thailand, Thai educational system, public policy, culture, and to enable the people of Thailand the case

of implementing early childhood child-centered and teacher directed western programs into the Thai culture.

CHAPTER III

METHODOLOGY

Success For Life (SFL), a neuroscience research-based program, educates early childhood teachers and caregivers about brain research findings and how to provide enriched environments to help children develop and learn to their full potential. The framework for *Success For Life* incorporates neuroscience and child development studies. Concurrently, the Success Through Academics and Reading (STAR) curriculum aligns with the Texas Essential Knowledge and Skills (TEKS), the Head Start Performance Standards and Developmentally Appropriate Practices. The general research question is whether or not the *Success For Life* program will be acceptable for meeting the needs of Thai public policy, Thai educational system, and Thai culture.

The purpose of the study was to investigate whether the implementing *Success For Life* in Thailand would be appropriate to Thai public policy, Thai educational system, Thai culture, and to determine what changes would be necessary for its success. This inquiry may provide insight into curriculum changes that are suitable to the Thai educational system and the Thai culture.

Sites

The researcher submitted a Request for Proposal to preschool programs in Bangkok, Thailand, to collaborate with the implementation of *Success For Life (SFL)*. The sites were eight (8) preschool programs. Two (2) of the sites were initial *Success For Life* site coordination locations in Thailand. The first site was located in Bangkok and the

second one was located in Konkaen province. Both initial sites were international programs, which provide international program within Thai socio-cultural background. The programs recruited native English and Thai to be classroom teachers. Administrators in the preschool programs selected the classrooms utilized in the study. The other six (6) collaborating preschools, including five (5) preschools located in Bangkok and one preschool located in Nakorn Pathom province, will implement *Success For Life* next school academic year beginning in June 2001.

Subjects

Forty-six (46) participants consisted of two (2) female and two (2) male preschool owners, five (5) female and one (1) male director, thirty-two (32) female preschool teachers, and three (3) female and one (1) male early childhood professionals. Preschool teachers were defined as those who taught four to six year old children. Administrators selected programs and determined which classrooms were to be utilized in the study. All of four (4) preschool owners, six (6) directors, and four (4) teachers who already implemented *Success For Life* in November 2000 were interviewed in the study as well as all early childhood professionals. Four (4) of twenty-eight (28) teachers who will implement *Success For Life* beginning June 2001 were randomly sampled for interviews. All of the respondents were Thai except one director and four teachers who implemented *Success For Life* in the classrooms were Caucasian. Every teacher holds certificates of teaching in kindergarten or for lower grade levels. Table 1 presents the characteristics of questionnaire respondents. Table 2 presents the characteristics of interview respondents.

Table 1

Characteristics of Questionnaire Respondents (N=46)

Characteristics	Frequency	Percentage (%)
Position Title		
Teacher	32	69.4
(implemented <i>SFL</i> in classrooms in Nov 2000)	4	8.7
(will implement <i>SFL</i> in classroom in June 2001)	28	60.8
Director	6	13.1
Early childhood Professional	4	8.7
Owner	4	8.7
Gender		
Male	4	8.7
Female	42	91.1
Ethnicity		
Caucasian	5	10.85
Asian (Thai)	41	88.97

Table 2

Characteristics of Interview Respondents (N = 22)

Characteristics	Frequency	Percentage (%)
Position Title		
Teacher who implemented <i>SFL</i> in November 2000	4	18
Teacher who will implement <i>SFL</i> in June 2001	4	18
Director	6	27
Early childhood Professional	4	18
Owner	4	18
Gender		
Male	4	18
Female	18	81
Ethnicity		
Caucasian	5	22.5
Asian (Thai)	17	76.5

Prior to the program implementation, participating teachers attended the teacher training workshop conducted by the *Success For Life* trainers on November 18-19, 2000 at Kasetsart University, Bangkok, Thailand. At that training session, each participant completed a pretraining questionnaire. A postraining questionnaire was collected at the end of data collection.

Instruments

Three (3) sources of data were utilized for this study. The first instrument was the teacher questionnaire. The questionnaire in this study was parallel to the questionnaire that was developed by Raquel R. Castro (1998) and used to explore teachers,' preschool

owners,’ and preschool directors’ understanding of their awareness of brain development and function, and their thoughts about implementing *Success For Life* in Thailand concerning its appropriateness to Thai educational system, Thai public policy, and Thai culture. The data from the questionnaires answered the following research questions:

1. To what extent does *Success For Life* apply to the preschool level in Thailand?
2. To what extent does *Success For Life* comply with public policy in Thailand?
3. What changes to *Success For Life* program are necessary to align it with Thai educational system? A sample of the questionnaire appears in Appendix D.

The second source of data was bimonthly journals kept by the participating teachers. The teachers were requested to write changes in their teaching style after receiving the training, experiences that they provided to young children relating to brain studies, and their feelings about the *Success For Life* implementation. The teachers were requested to mail bimonthly journals to the researcher at a central address in Bangkok. Data from bimonthly journals answered the research questions of “To what extent does *Success For Life* apply to the preschool level in Thailand,” “To what extent does *Success For Life* align with public policy in Thailand,” “To what extent is *Success For Life* align with Thai culture,” and “What changes to *Success For Life* are necessary to align it with Thai educational system and culture?” Teacher biweekly journals appear in Appendix E.

The third source of data consisted of personal interviews regarding teachers’, and preschool owners’, and preschool directors’ understanding of the growth and development of children, as well as their awareness and knowledge of brain development and function, knowledge about how children learn, interaction with children and parents,

stimulating environment, and developmentally appropriate materials and methods. In addition, the questions targeted teachers' and preschool owners' and preschool directors' opinions of the *Success For Life* implementation in Thailand, thoughts about the process of the *Success For Life* implementation, and experiences of teacher changes after receiving training. The participants answered questions such as, "What do you think about the Success For Life program?" The researcher asked similar questions to all participants about the effect of *Success For Life* implementation in Thailand (See Appendix F). The semi-structured interviews were recorded and transcribed yielding descriptive data. Gall, Borg, and Gall (1996) described the semi-structured interview as a series of structured questions asked by the interviewer followed by more open-form questions to obtain additional information. The information obtained from the interview added and supported the questionnaire results.

Procedures

The researcher distributed Request for Proposals to public and private child care centers, preschools and kindergartens in Thailand. The Request for Proposal allowed the researcher to identify sites to collaborate with the implementation of *Success For Life*. A total of eight (8) preschool owners indicated an interest in participating in the study. A list of all sites appears in Appendix B. All participating preschool owners, directors, and teachers were invited to attend the information meeting in October 2000. The meeting provided the preschool owners, directors, and teachers with an overview of the entire project, the project requirements, responsibilities, and those of participating teachers.

Each participating site was given the responsibilities of selecting which classrooms and teachers would participate in the pilot study. Teachers selected from each site attended a full day of training on November 18th and 19th, 2000 at Kasetsart University, Bangkok, Thailand. The initial training included several topics, including overview of *Success For Life* and its basic components, the *Success For Life* classroom activities, a teacher-directed-child-centered learning, a formal assessment, pre-training teacher questionnaire, bimonthly journals, and the use of EnVision, two way audio-visual desktop interactive system which utilizes internet link. Each participant received two information books along with the teacher training. The first book included information about *Success For Life*, developmental and neuroscience research, implications for early childhood education, the elements of *Success For Life* classroom and environment, and examples of the *Success For Life* curriculum. The second book consisted of eleven subject curriculums, including Literacy, Math, Science, Creative Arts-Music, Creative-Arts, Creative-Dramatic play, Wellness and Healthy Living-Health and Safety, Wellness and Healthy Living-Physical Development, Technology, Social Studies, and Character Education. In addition, the teachers learned how to implement *Success For Life* in their classrooms. The trainer gave teachers concrete and hands-on examples of experiences to implement in their early childhood classroom. The experiences were focused on children's learning in subject areas of literacy, mathematics, science, music, visual arts, creative dramatic, health and wellness, technology, social studies, and character education. Teachers had opportunities to ask questions and exchange ideas and opinions with the trainers about the Thai educational system, the Thai educational reform, and the

Thai culture. At the conclusion of the training, one classroom for each two preschools was ready and prepared to begin program implementation.

Data collection included 9 steps:

1. All teacher-training participants were asked to complete the pre-teacher training questionnaires in order to express their opinions and suggestions on the teacher training and their opinions on whether *Success For Life* conforms with Thai culture and Thai public policy.

2. The researcher sent the letter of request with a sign-up sheet to every participant.

3. The researcher then sent questionnaires and a consent form to the participants. In addition, the researcher explained to the participants the purpose of study, the length of the project, and the procedures. The consent form describes participants' right to withdraw at any time during the project and the benefits of the inquiry. The researcher used numbers only and assured participants that their names would not be used in the research project or released in any way to anyone. The participating teachers were requested to reflect upon their thoughts in the questionnaire about *Success For Life* and how it is compatible with Thai public policy, Thai educational system, and Thai culture.

4. The researcher conducted face-to-face interviews with 22 representatives. A total of twenty-two (22) respondents included four (18%) early childhood professionals, four (18%) preschool owners, six (27%) directors, and eight (36%) teachers. The researcher interviewed all early childhood professionals, all owners, and all directors who participated the training. Interview questions were about activities and the teaching in the

classroom. The investigator used random sampling technique to interview eight teacher representatives.

5. The researcher made appointments for interviews with each participant.

6. The researcher used a tape recorder during the interview. In addition, the investigator wrote notes that summarized the results. The researcher took brief notes for each question during the interview that could be expanded after the interview was over.

7. The researcher also sent a copy of the researcher's notes to each subject and gave them an opportunity to add or revise as necessary to increase accuracy. The interview allowed for greater depth and richness of participants' thoughts and suggestions for the *Success For Life* implementation in Thailand.

8. The researcher requested teachers who implemented *Success For Life* in their classrooms to write bimonthly journal about changes made in the classroom environment, experiences provided for children relating to brain development, feelings about the *Success For Life* implementation in Thailand and the needs for *Success For Life* to align with Thai Education Act (1999), Thai educational system, and Thai culture. Teachers were asked to mail or fax bimonthly journal entries to the researcher. Journal entries provided valuable qualitative data for the study.

9. The researcher conducted interviews with the participating teachers by using EnVision, a two-way audio-visual desktop interactive system which utilizes internet link videoconference.

Research Design and Data Analyses

The present study involved a descriptive research describing certain educational phenomena, that is, the expression of the subjects' opinions on the implementation *Success For Life* in Thailand and the need to comply with Thai Education Act (1999), Thai educational system, and Thai culture. Preschool owners, directors, and teachers were asked through interviews with the researcher to provide input regarding program quality and effectiveness. The researcher used open-ended questions to obtain information regarding the understanding of child development as well as their awareness of the brain development and function. The questions included relationships between teachers and the children, relationships with parents and families, teachers' roles and responsibilities, environmental factors stimulating young children's development, developmentally appropriate materials and methods, and suggestions for the *Success For Life* implementation in Thailand. The information obtained from teacher journals, field notes, and interview was coded and divided into response categories.

The researcher transcribed interview data in Thai and translated to English. Three Thai early childhood bilingual professionals reviewed and used a back-translated technique to check for content reliability. Data were analyzed through a coding strategy based on suggestions provided by Bogden and Biklen (1998). The development of this coding system required the researcher to read through the data and look for patterns and topics. In addition, discussions about categorizing themes and patterns for this study were conducted with three Thai Professors who are experts in their fields. The researcher was then able to individually sort each response into the appropriate category. The data were

presented in two forms: quotations from participants in different categories of analysis and descriptions of retention practices.

Time Line for Data Gathering

November, 2000	Teacher training, Pretraining questionnaire <i>Success For Life</i> implementation
December, 2000	Mentoring interview through EnVision Face-to-face interview and classroom observation Obtaining bi-monthly journals
January, 2001	Face-to-face interview and classroom observation Obtaining bi-monthly journals
February, 2001	Face-to-face interview and classroom observation Obtaining bi-monthly journals
March, 2001	Posttraining questionnaire Final meeting with participants

CHAPTER IV

RESULTS

Data for the study were gathered from three resources: questionnaires, personal interviews, and teacher journals. Questionnaires (See Appendix D) were utilized to gather information before and after subjects received the *Success For Life* training. The questionnaire was administered before program implementation (pre-training) in order to estimate the initial knowledge of teachers. This questionnaire provided data about teachers' knowledge regarding how children grow and learn and their awareness of brain development and function. After the teacher training, teachers filled out the post-training questionnaire. This questionnaire was identical to the questionnaire teachers had filled out at the beginning of the study. The comparison of data collected at two different points of time permitted the researcher to measure changes in the knowledge and understanding of teachers regarding brain research and the implementation of *Success For Life*. The content for the questionnaires contained *Success For Life* items, questions about teachers' beliefs and general responses to *Success For Life* experiences. The questionnaire also used open-ended questions to allow respondents to provide analytical and critical qualitative data. However, the participants did not provide enough indepth information to analyze; therefore, personal interviews were conducted to expand the participants' thoughts. Personal interviews were conducted with preschool owners and teachers who implemented the *Success For Life* curriculum during the study and will implement *Success For Life* in the next school academic year (June 2001). Interview

questions appear in Appendix F. Journal reports (See Appendix E), providing valuable information about changes made in the classroom environment and experiences provided for the children relating to brain research, were collected from teachers on bi-weekly basis.

Collected data were divided into categories based on recommendations of Bogden and Biklen (1998). These researchers recommend the development of a coding system. The development of this coding system requires the researcher to read through the data and look for patterns and topics. Bogden and Biklen (1998) refer to identifying topics and patterns as coding categories. Coding categories are “a means of sorting the descriptive data so that the material relating to a given topic is placed in an appropriate category.” For the present study, discussions about categories that respondents answered for each research questions were validated with professors of education at Chulalongkorn and Kasetsart Universities. This process provided agreement of patterns and the types of responses that included in each category. These data enabled the researcher to sort and analyze information along a number of dimensions, including those outcomes associated with the use of *Success For Life*.

A total of forty-six (46) questionnaires gathered from four (8.7%) preschool owners, six (13.1%) directors, four (8.7%) early childhood professionals, and thirty-two (69.4%) teachers. The Thirty-two participating teachers (69.4%) included four (8.7%) teachers who implemented *Success For Life* in the classroom in November 2000 and 28 (60.8%) teachers will implement *Success For Life* in the classroom in June 2001.

All of the four (4) preschool owners, six (6) directors, four (4) teachers who implemented *Success For Life* in November 2000, and four (4) early childhood professionals who participated the teacher training were interviewed. In addition, four (4) of the twenty-eight (28) teachers who will implement *Success For Life* in June 2001 were randomly sampled for interviews. The responses were divided into categories based on discussions with early childhood professionals.

Research question 1: To what extent does *Success For Life* apply to the preschool level in Thailand?

The responses to the question and the extended questions revealed the extent *Success For Life* applies to the preschool level in Thailand as perceived by the interviewees. Table 3 presents participants' responses, which were divided into categories and which provide answers to Research Question 1.

Table 3.

Contents in the *Success For Life* program that apply to the preschool level in Thailand

(N=22)

Contents	Frequencies	% Agreement
1. Core values and beliefs	22	100
2. Curriculum	22	100
3. Family education	22	100
4. Family involvement	22	100
5. Teacher training and staff development	22	100
6. Teacher's roles	20	90
7. Assessment	15	67.5
8. Critical thinking	8	36
9. Teaching strategies and ideas for activities	6	27
10. Computer and technology	5	22.5
11. Class size	5	22.5
12. Community involvement	5	22.5

Table 3 shows that 100% of the respondents specified that, as indicated in *Success*

For Life, core values and beliefs, the curriculum, the teacher training, the family education, and the family involvement were applicable to the preschool level in Thailand.

Although all (100%) respondents indicated that the *Success For Life* curriculum was appropriate to use in Thailand, six (27%) suggested modifications in order to make the *Success For Life* curriculum more effective. Recommended modifications for the *Success For Life* curriculum are discussed in research question 4.

The following are examples of quotes and additional reports answered by respondents identifying the category of the *Success For Life* contents that applied to preschool in Thailand.

1.1 Core values and beliefs

Success For Life believes that: 1) Literacy development is a pathway to success in school and life. Literacy is the civil rights movement of the new millennium. 2) Direct and systematic instruction promotes academic achievement. 3) Students should participate in the learning process the majority of the time in the classroom. 4) The learning process should be focused on individual students and helping each student learn to their fullest capacity. 5) Parents want their children to be civil, independent, responsible, sociable, and do well in school and life. 6) Parents want their children to achieve, at an early age, the skills necessary for success in school and life: literacy, reading, math, and science. 7) Schools and other educational programs should be places that have high expectations for children, and help assure their high achievement and success. 8) Teachers are the driving force in setting the standard for quality care and education.

All respondents (100%) agreed that the *Success For Life* core values and beliefs could be applied to Thai early childhood programs. *Success For Life*, a neuroscience research-based early childhood education program, integrates theories of human development that stress the importance of children's active involvement in academic learning activities and directed activities provided by nurturing teachers and families. Respondents indicated that all Thai preschoolers are expected to communicate effectively before they enter the kindergarten. Examples of respondents' statements included: "I think we should prepare preschoolers to be ready for school by ensuring that the youngsters can read and write before entering grade 1 and that they meet the *Success For*

Life core values and beliefs;” “I agree with the core values and beliefs in the *Success For Life*. Language is a major key to enable children to understand what others say and to respond their thoughts to others;” “I like the idea that the *Success For Life* states clearly that literacy development is a pathway to succeed in school and life because every children use language to communicate everyday;” “I agree with the *Success For Life* that children should gain experiences from real materials and direct instruction.” The director stated,

I believe that the *Success For Life* core values and beliefs are important.

Language is a way to talk and communicate and it is a way that children express knowledge. No matter what nationality children belong to, language is always important for children’s lives.

The professional stated,

Literacy skills underpinned almost all-future learning in school and in the workplace. We have to assure that children will enter school with a decent chance of success in reading. So I think the *Success For Life* beliefs can be applied in Thai preschools.

The teacher stated,

It is essential that all young people quickly achieve high levels of functional literacy, which include the ability to read, write and compute and to use these abilities to solve problems in everyday life, because the literacy demands of modern society were increasing all the time. When children walk on the street, they need to read signs. Children must understand the value of money in order to

use it. When children do not have enough money, they must solve problems that relate to work and income.

Another teacher stated, “I agree with the *Success For Life* core values and beliefs because I give the priority on reading. Reading is central to children’s experiences in school. How well children learn to read sets the foundation for future success.”

Based on the interview results, all of the twenty-two respondents agreed that students should participate in the learning process the majority of the time in the classroom. Examples of the statements were: “I think children should spend most of time to learn and teachers should support children’s learning by preparing environment and materials for children to learn;” “I prepare games and exercises such as counting numbers drawing, and painting pictures for young children to do before the class begins and after school;” “Pupils should spend most of their time involving in activities that promote children’s development and learning;”

When children come to school in the morning, I allow them to do activities that they like in the classroom. Some children prefer reading books at the literacy center. Others like to play blocks. I provide a variety of activities and environments to help them gain experiences in school.

Results indicated that the *Success For Life* core values and beliefs are comply to use in the preschool level in Thailand. Respondents agreed that literacy development is a pathway to success in school and life. Students spend the majority of time participating the class activities.

1.2 Curriculum

The *Success For Life* curriculum and activities provide academic skill development in Literacy, Science, Mathematics, Music, Art, Dramatic Play, Health and Safety, physical Development, Technology, Social Studies, and Character Education.

The literacy curriculum gives children opportunities to interact with responsive adults and peers in language and print-rich environments. The literacy curriculum promotes young children to develop vocabulary, extended language skills, and knowledge of the world around them. Children develop listening comprehension and phonological awareness; understanding of the everyday functions of print; motivation to read; appreciation for literary forms; and print awareness and letter knowledge. Children learn what books are and how to use them. Understanding the value of literacy as a means of communication, as well as coming to enjoy reading, are accomplishments typical of the future good reader.

The *Success For Life* mathematics contents cover numbers and operations, patterns, geometry and spatial sense, measurement, and classification. Children will learn the concept of zero, count by ones to ten or higher, recognize and reproduce simple patterns of concrete objects and shapes, make size comparisons between objects, and match objects that are alike.

Science courses are designed to help young children gradually develop the skills of observation, recording information, creating charts, investigating and describing observations, comparing objects, and identifying similarities and differences. At the same time, children will acquire the concepts of living organisms, senses, animal habitats,

animal body parts, the seasons, what plants need, similarities, and things in the environment.

The *Success For Life* Music activities include using loud and soft voices, singing, distinguishing among the sounds of instruments, playing musical instruments, and singing along with movement. In addition, children begin to respond to music of various tempos through movement.

Art activities in the *Success For Life* encourage relaxation, exploration, and pleasure. Children use a variety of materials such as crayons, paint, clay, and markers to create their artwork. Teachers select activities that match children's needs. Children will share ideas about their artwork.

The Dramatic Play curriculum prepares children for the challenges of real life. The experiences contribute to young children's development with opportunities to develop skills in cooperating with other children. Dramatic play in the *Success For Life* curriculum can be flexible, stimulating the imagination while encouraging language and vocabulary skills. The children practice problem solving, especially when they engage in dramatic play while gaining satisfaction from group interaction.

The Health and Safety curriculum offers activities introducing concepts to encourage healthy and safety practices. Familiarity with good health, safety, and nutrition practices establishes healthy habits for the entire life span. Appropriate and meaningful experiences help children to understand more about themselves and their relationships with others. Each child needs to learn about and appreciate his own body functions and needs. This awareness will contribute to a sense of self and to good mental health.

Physical development activities support children's physiological needs for activity, sensory, stimulation, rest, and nourishment. *Success For Life* provides a variety of experiences that help children develop physically. Examples of the physical development activities include throwing an object, jumping with ropes, and playing a game with movement.

Technology activities provides children with experiences in using a variety of devices, including a mouse, a keyboard, a printer, and a CD-ROM. Children use software programs that enhance children's learning experiences.

The Social Studies curriculum is targeted on the education of young citizens to be well-informed and to develop skills necessary for competent participation in society. The goals of the social studies course include helping children attain basic concepts of environment, such as seasonal changes, children's roles and responsibilities, and community.

Through character education activities, young children demonstrate and develop friendships with others, demonstrate self-control by following simple classroom rules, and express thoughts, feelings, and ideas through language as well as gestures and actions.

Interviewees indicated that the *Success For Life* curriculum and activities were applicable to their early childhood programs. Examples of interviewees' statements were:

I view the early childhood curriculum in a way that is most natural to children.

The *Success For Life* curriculum allows children to engage activities that help them develop essential knowledges and skills for future success.

A second respondent stated, “The *Success For Life* curriculum emphasizes academic learning which meets the needs of parents and families who prepare children to be ready for school.” A third respondent indicated,

As children enter kindergarten for the first time, they are acquiring the basic skills associated with the development of early reading and mathematical literacy, such as the recognition of letters and numbers. A curriculum such as *Success For Life* is applicable to use in Thai preschools because the program provides children the cognitive, linguistics, and skills that are necessary for learning at a higher level.

The respondents indicated that families desire to register their children in prestigious elementary schools; however, the reality of the situation is that those prestigious schools are unable to accept all children. Hence, the issue of high competition for school entrances is always present. Four preschool owners indicated that families are looking for an academic program that prepares their children to be ready for the first grade entrance examination. The owner stated,

Most of the first grade entrance examinations include the tests of literacy skills and mathematics knowledge such as numbers, shapes, and the comparison of objects. So preschoolers who are trained in the *Success For Life* program should be able to do the test.

Another owner indicated,

Success For Life provides a variety of meaningful activities that help children develop concepts and skills in mathematics, science, and social studies. For

example, children measure sand and water, observe and record changes in the environment, and explore animals and plants. These activities build necessary learning skills for children.

The four owners indicated that the *Success For Life* curriculum corresponds with the families' needs in emphasizing an academic approach and is based on neuroscience research. Two of the international preschool owners were satisfied with the program because their teachers could follow the *Success For Life* curriculum without the need of translation. These teachers were English native speakers who has taught in Thailand for several years. The other two Thai preschool owners, whose preschools follow the regular Thai program, suggested that the *Success For Life* curriculum should be translated into Thai so that the teachers understand the curriculum and activities more clearly. In addition, ten respondents recommended that the *Success For Life* curriculum should include moral education such as the character traits of honest, respect, and responsibility and financial education addressing concepts of value of money, saving, and spending. The course of moral education deal with every aspect of moral characteristics, including types of moral characters, meditation and praying. The professional stated, "Thai children should be trained in moral education since they are young."

Four teachers, who implemented *Success For Life* in their classes, indicated that children enjoyed the *Success For Life* activities. One teacher noted in the biweekly journals that children loved to make books, where they wrote stories and drew pictures by themselves. Then, children brought their books home and told stories to their parents. Another teacher stated,

Last week, the children engaged in the “Flower Shop” activity. I prepared four learning centers. The first center was a dramatic play. A small group of children acted to be florists and another group were customers. They pretended to sell and buy flowers. Children have opportunities to create stories, communicate and engage in cooperative activity with others. The second learning center was literacy. I prepared picture books that illustrate a variety of flowers and names. The third learning center was art. Children drew and colored a picture of flowers that they liked the most. They were allowed to present their artwork. Young pupils explore a wide variety of materials and make discoveries about color, shape, and texture through art experiences. The last center was the mathematics. Children did the math problems. The example of the math problem was “If the children have ten baht, how many bunch of flowers they can buy?” “If they do not have enough money, how they solve the problem?” Children learn the concepts of numbers and estimation. They also learn to solve problems as well.

Four teachers said that after *Success For Life* was implemented, children displayed increased vocabularies and language skills. One teacher indicated,

The language comprehension of preschool children expanded rapidly. Vocabulary increased at an amazing rate, with new words added daily. Parents sent notes to me indicating appreciation that their children could correctly read stories to them. Moreover, children were able to read print.

The teacher continually stated, “Children enjoy creative arts, music, and movement activities.” Two teachers indicated that young pupils showed increases creative thinking

skills in music and movement activities. Five respondents indicated that the *Success For Life* activities allowed children to develop literacy and mathematics skills which are included in the first grade entrance examination in some schools. One respondent stated,

Language gives students the means to talk about mathematics, science, and music.

Language can clarify the children's feeling. I agree with the point that *Success*

For Life emphasizes that language begins the path to success. I think the *Success*

For Life core values and beliefs are applicable for use in Thailand.

Teachers revealed that the *Success For Life* activities prepared students for school readiness. One teacher stated,

I start a hand-clapping pattern, and ask the children to first listen to the pattern

and then join in. Children can also be asked to provide a hand-clapping pattern.

Listening is a basic skill to assist young children in improving other necessary

skills that prepare young children for school readiness.

Another teacher stated, "*Success For Life* has succeeded in helping children in my preschool in improving reading skills. I think a child's success in the first grade often depends on how much the child knows about language, reading, and vocabulary before entering school."

Based on the interviews, participants understood that books and materials should be appropriate to children's age levels. Experiences, such as introduction of big books and vocabulary building through memory games, allow children to link concepts with receptive and expressive language. However, eight respondents indicated that they had difficulties finding the big books that are suggested in the *Success For Life* curriculum,

because the big books have not been published in Thailand. Seven respondents, including three owners and four teachers, specified that they solve the problem of using big books by making their own big books and matched the content of the *Success For Life* curriculum. One teacher showed the big book that she made. The teacher stated, “I translate this book that is suggested in the *Success For Life* curriculum to Thai.” Another teacher said,

I wrote a big book and drew pictures by myself. The theme of the story teaches young children to be selflessness. I adapted the material that suggested from the *Success For Life* activity. The purpose of this activity is that children understand that a book has a title and an author. I let children touch the book and read the title and the author’s name with me. Then, I read the story for them. I also asked them to choose books they want me to read to them.

The *Success For Life* curriculum supports children’s development. Results revealed that the *Success For Life* curriculum was appropriate at the preschool level in Thailand. The curriculum corresponds to the needs of families who want their children to achieve the skills necessary for success in school and life. The owner stated, “Parents expect that by the time young children enter the first grade, the majority of them have the ability to sit, stand, run, throw and catch a ball, understand the concepts of addition, subtraction, and geometry.” The second owner revealed,

Parents demand to enroll their children in the prestigious primary school which accepts the children who are able to pass the entrance examination. So parents want their children to be successful in academics and be ready for the test. I think the *Success For Life* curriculum is suitable to use here.

The third owner stated,

A number of prestigious primary schools accept preschool candidates scoring high in a grade 1 entrance examination. Preschools must prepare young children to learn academic skills such as reading, writing, counting, and adding, numbers. So I think the *Success For Life* curriculum is appropriate to use in my school, because *Success For Life* supports learning practices that provide challenge and achievable curriculum engage children in thinking and communicating with others.

Respondents suggested that the *Success For Life* curriculum should include moral education such as honest, respect, self-discipline, and responsibility. In addition, *Success For Life* should include financial education addressing the concepts of value of money, saving, and spending. The owner stated,

Children use extravagant items such as backpacks with brand names. I think children should be trained about the financial education and moral education so that children understand the value of money and do not spend money on things that are unnecessary to use.

The second owner revealed, “Thai children should learn the use of money since they are young.” The teacher stated, “I think *Success For Life* should add the moral education in the curriculum and activities.” Respondents indicated that the Mathematics curriculum should be modified to include higher concepts. Respondents stated,

I like the mathematics activities in *Success For Life* which provide exploration and discovery. Children learn to arrange, compare, measure, order, pair, pattern,

and reverse in mathematical activities. However, my preschool children count and learn higher concepts of numbers than that required in the *Success For Life* curriculum guidelines indicates. I think the *Success For Life* curriculum for Thai preschoolers should be modified.

The director stated,

Preschoolers are encouraged to recognize mathematics in their daily lives in order to understand the importance of mathematical literacy in the world. Throughout mathematics curriculum, students in this school learn numbers, patterns, relationships, measurement, probability and statistics. Children enjoy the *Success For Life* Mathematics activities, but I think some activities need to be changed because they are too easy for my pupils.

1.3 Family education

Family education is one of the *Success For Life* components. The family and parenting education program in *Success For Life* is offered to families of young children. Sessions are tailored to address the needs of parents and families of infants, toddlers, and preschool children and include information to enhance the roles that parents play in the development of their children at different stages of development. The sessions have common thread woven throughout so that parents continuously hear and see modeled demonstrations in relation to appropriate parenting practices, how to enhance the parent-child relationship, how to positively influence their child's brain development and ensure healthy behaviors. Thai parents received the distribution of an informational brochure for families to create enriched and support learning environment in the home. Furthermore,

George S. Morrison, the *Success For Life* founder, was invited by preschool owners in Thailand to lecture on the importance of enriched environments and early experiences to parents and families. All respondents (100%) agreed with *Success For Life* that that a family education was crucial. One early childhood professional emphasized, “It is essential that parents and families prepare their children for success in school and life.” The owner added, “I agree with *Success For Life* that parents and families share responsibility for ensuring their child's school success. They should know the development of their children at different stages of early development.” The teacher stated, “Parents and families should receive training on how to raise young children to be successful in school and life” Unfortunately, not all families know the importance of and pay attention to the preparation of the young child’s school readiness. One respondent stated, “Although many families know that they play important roles in providing positive environments for their children, they do not have time to participate in the family and parenting education program. Some families send nannies to attend the family meeting.”

Three respondents, including one early childhood professional and two preschool owners, expressed that there were very few schools that provided educational programs for parents. The three respondents reported that many parents believed that providing children’s education and care was the teachers’ major responsibility and not their own. Therefore, many parents refused to participate in the family educational program. The professional stated,

Providing education to parents and families is a new and important issue for Thai

education. Parents play important roles in the optimal development and learning of children. Early childhood educators' responsibility is to assist them through parent training efforts in fulfilling their role as the child's first and most important teacher. There are not many schools and educational institutions that offer educational programs for parents and families like *Success For Life* does."

One preschool owner stated,

I think most parents understand the importance of the family educational program, but they do not pay attention to attend the training. I conducted the survey to see whether parents were interested receiving the parenting training. The results showed that they wanted the school to set up the training for them. However, when the training was held, there were not as many parents in attendance as I expected.

Another owner stated,

I think that the informal education that the family provides for their children makes more of an impact on a child's total education than does the formal education system. I think it is important that the Thai parents and families receive the training that provides knowledge about children's learning.

Respondents showed that family education was crucial for parents and families of preschool children. Early childhood programs in Thailand should give more emphasis to the importance of enabling teachers and families to support children's development in academic/cognitive, social, emotional, physical, linguistic, and artistic/creative content. Special emphasis should be placed on family education and toward increasing public

awareness of factors important to children's optimal development in early childhood.

Respondents confirmed that the family education component in *Success For Life* meets the need of Thai early childhood professionals and parents.

1.4 Family involvement

Because family and school represent the primary environments in which young children grow and develop, it is important to build and maintain strong parent participation in preschool education. All of the twenty-two (100%) interviewees indicated that family involvement is a crucial component in making families better understand early childhood programs, devoting themselves for their children's learning, and collaborating with teachers to help their children succeed in school and life. The teacher addressed, "I agree that parental involvement helps children succeed in school and life." The director stated,

I believe both parents and teachers are responsible for a child's education. While teachers are expected to provide an academic and social education, the parents must impart the whole of their family's culture and values. Thus, whether a teacher is in complete agreement with a particular family's approach to child rearing or not, it is important that the parents be met with an attitude of respect and cooperation.

Results indicated that family involvement is applied to preschools in Thailand. Inviting parents to participate in classroom activities gives them a firsthand opportunity to see the children's responsiveness to involvement activities. However, time and scheduling constraints are prohibitive to many parents and families.

The first preschool owners stated,

Many families drop their children off at the main gate in the morning and leave.

When they pick up their children after school, they wait at the gate. The teachers call their children by using the microphone. So, families or parents have no chance to meet with the teachers or talk about the children's learning.

Another preschool owner stated,

Time is valuable for the Bangkokian. Parents usually participated the school activities, such as the new year party and the school fair, the sport day, and the children's day. Nevertheless, they rarely become volunteers in the classroom.

Some parents are uncomfortable to help because they do not have highly educated. Others do not have a lot of free time to help their children learn.

The director stated, "On the school fair, the parents were asked to help in raising funds by selling food and drinks or donating and selling snacks. The funds that the school obtained on the school fair is for school facilities, such as for the purchase of computers and air conditioners." Two teachers indicated that parents and families are rarely available volunteer in telling about their careers in community lesson to children. One teacher stated, "Since I become a teacher, I have never seen any parents volunteer to help out in the classroom." Another teacher stated, "There are several parents who cooperate with the class activities. Volunteers are always the same parents." Three respondents indicated that teachers are uncomfortable involving parents and families in the class activities. They felt that when parents and families present in the classroom, their children do not pay attention to the study. One preschool owner stated,

There are many opportunities for families to interact with the school. The school provides a teacher-parent meeting once a year so that parents have opportunities to meet and share information with teachers about their children. The teacher-parent meeting promotes interaction between parents and teachers. It is important for families to be involved in their children's formal education. Parents should understand the philosophy and curriculum goals of their child's preschool program and encourage their children's school activities.

1.5 Teacher training and staff development.

The *Success For Life* teacher training offers a wide range of professional training that is designed to increase the knowledge, skills, and effectiveness of early childhood professionals so they can help children with the academics and social skills essential for learning. In recent years, the teacher training and staff development for Thai preschool educators has become a key component of Thai preschool improvement plans (Office of the National Education Act, 1999). All respondents indicated that the teacher training and staff development component in *Success For Life* is beneficial for teachers and staffs in school. Examples of the respondents' statements include "The *Success For Life* teacher training is applicable to the preschool teachers in Thailand." "The training supports instructional strategies." "I gained experiences of teaching strategies from the *Success For Life* training." Four respondents indicated that recruiting teachers whose educational backgrounds were early childhood education, child development, or related areas was difficult to find. Only a few of them were qualified. The owner stated,

When the numbers of teachers are short, I hire teachers who graduate from non-

related areas of early childhood education, but who love and care for young children. I think if the teachers care for young children, it is not difficult to train them about how to educate young learners.

The teacher stated, “The teacher training increased skills and techniques to teach young children. I am more confident after receiving the *Success For Life* training.” Another teacher stated, “I think the *Success For Life* training enhances the quality of instruction.”

Preschool administrators have paid attention to increasing their teachers’ professional development. Five respondents, including two preschool owners and three directors, indicated that they sent the teachers and staffs to participate in the teacher training and educational conferences that are offered by educational institutions and by the Office of the Private Education Commission. The previous training provided information about the implementing of developmentally appropriate practices in the classroom, understanding child developments, and implementing whole language and phonics approaches to reading.

Teachers who participated in *Success For Life* were educated to incorporate neuroscience and developmental research-based activities into their classrooms in order to create stimulating environments for young children. Based on the journal, one teacher

noted, “I learned from the *Success For Life* training that children link words and sounds and objects. So I labeled items and had the children spell and read words every morning. Children memorize those words and can spell by themselves without my help.” Another teacher stated, “Research suggests that music influences mood and decreases stress hormone levels in the blood. So I turn on the soft music before the class begins and after school.” The findings from all forty-six questionnaires indicated that participation in the program’s initiatives enhanced teachers’ abilities to create enriching learning environments and positively influenced critical areas of the child’s development. Information obtained from the study indicated that teachers became more aware of how to apply what they learned in their programs. Also, teachers indicated they became more knowledgeable about new research and information relating to brain development and children’s learning. Examples of statements included: “I learned that during the earliest years much of a child’s learning capacity is developed and that interactions with the environment during these critical years help lay the foundation for behavioral and developmental outcomes;” “I learned that enriched environments in the early years can provide a pivotal influence on learning and behavioral outcomes and will better prepare children to enter the primary schools;” “After receiving the *Success For Life* training, I am aware of whatever I provide for children today will affect to the children’s success in the future.”

Respondents to the survey indicated that they were better able to make connections between research findings and how to apply these research findings to daily activities. One owner indicated, “I like the *Success For Life* program because it is based

on brain research and it is new to the Thai early childhood program. I understand theories of child development better.” The teacher stated, “Children need many experiences to help them develop literacy skills in school. I provide a variety kinds of literacy activities, such as posting word cards on the wall, playing a variety kinds of music, making picture books and music connections.” Another teacher stated, “I learned that early care and education directly affects how children develop and this influences their capacity and ability to learn throughout life. I also learned that open-ended questions allow children to create critical thinking better than the questions that limited children to answer such as yes-no questions.” The third teacher stated, “I establish a positive environment in the classroom. I create a positive talk, show affection and sincere interest in children, listen attentively to what children say, and use children’s interests as a basis for conversation.”

Moreover, the data indicated that the *Success For Life* teacher training should be provided at least three times a year. Participants were interested in learning more about how to help young children develop critical thinking, using questions to develop critical thinking and for applying classroom management. Functions of how each brain part relates to learning and the application of brain and neuroscience research to the classroom were additional areas of interest. The study’s findings revealed that teacher training should include hands-on activities and a variety of activities to meet the needs of children with different learning styles. All respondents revealed that they gained experiences from the teacher training, participation and collaboration with the *Success For Life* staff and the faculty members from the Faculty of Education at Kasetsart University and the University of North Texas. Examples of respondents’ statements were “The *Success For*

Life training promotes my professional career.” “The *Success For Life* training increases knowledge about the child’s development and practices to enhance children’s learning.” “I would like to see the educational institutions in Thailand provide teacher training like *Success For Life*. Teachers need to experience teaching strategies.” “I don’t see much training provided by the professionals at the university level. I think it is a good idea that professors and the faculty members collaborate and provide training for teachers.”

The findings showed that the *Success For Life* training and staff development were critical. One teacher indicated, “I need to brush up on new teaching techniques, since I left the school several years ago. I think it is important that teachers should update new information about instruction and new research findings to help children’s learning.”

The director revealed,

Teachers and staffs got benefits from the training. I think it is essential for teachers to learn new information all the time because children today are different from the children in the past. Children today learn from media and internet. If teachers are not enthusiastic persons, their knowledge may be behind the children’s.

The content of the *Success For Life* training is suitable for preschool teachers. The teacher stated, “I think the *Success For Life* training covers content that is appropriate to the needs of Thai teachers and early childhood professionals.” The professional indicated,

I think Thai teachers could apply the knowledge that they learned from the training. I need to have experiences of hands-on activities so that I can see pictures and activities to show to young children.

Three teachers suggested that the next *Success For Life* teacher training program contain strategies for young children with different learning styles. The first teacher stated, “Children differ in the learning styles. Teachers should understand styles of learning and know teaching techniques help each child develop learning in a full capacity.” The second teacher revealed, “I need specialized training in working with children with different learning styles.” The third teacher expressed,

Every child possesses several distinct learning traits. Some children learn better when they learn by themselves, whereas others learn better when they work with their classmates. I think teachers should be trained about teaching techniques for the children with different learning styles.

1.6 Teachers’ roles

Many teachers see their roles encompassing not only teaching specific content but also mentoring young students. *Success For Life* indicated that teachers respect the individuality of each child. Children are permitted by the facilitative teachers to learn in different ways, depending on their own needs, interests, and preferred learning styles. One professional indicated,

Children are allowed to be active in their learning rather than passive in a teacher’s wisdom and knowledge. Children are encouraged to think on their own, make their own decisions, and rely on their own ingenuity. The teacher can still provide direct instruction but must decide when it is appropriate to do so. This is

different from assuming direct instruction as the norm. Teachers in *Success For Life* spend a majority of time on instructional activities that support academic growth and real-life applications to life and work.

Twenty respondents agreed with *Success For Life* that the role of teachers has changed from an expert to a facilitator and a coach. The professional stated,

The old-fashioned way of Thai teaching is that teachers transfer as much knowledge as possible to students. Under the new method, students must be taught how to learn by themselves as much as possible, and from various sources. This change facilitates the teaching-learning process by modifying the traditional directive control of the educator or instructor. As the learning environment becomes more effective, the teachers can encourage and guide learners in using available information resources toward appropriate, and collaborative work with other students.

One director stated, “Recognizing each student's name and face is not enough for teachers’ roles. Actually, the teachers have to understand the learning ability of all of their students.” Eight teachers stated that they spent a majority of time on instructional activities that supported academic growth and real-life applications to life and work. The eight respondents indicated that, after the *Success For Life* training, there were more interactions and more face-to-face contacts between teachers and young pupils in cooperative learning situations. The first teacher stated, “When I talk with young children, I make eye contacts with them and touch them. I want to ensure that the children know that I listen to them when they are talking with me.” The second teacher

disclosed, “I talk with children and pat their shoulders or hands. I think the children feel warm when they are with me.” The third teacher revealed, “I sit down and talk with children so my eyes are on the same level as the children’s eyes.” Three teachers indicated that they encouraged students to work independently, use the materials that met students’ own learning needs, abilities, preferences, and interests. In addition, the program allows the students to spend more time in small discussion groups or in working on collaborative projects with their peers. The three respondents indicated that such interaction was essential to effective learning. Examples of the respondents’ statements were: “I allowed pupils to participate in social groups. I told them rules of teamwork, rules of turn taking, sharing, and waiting. I was with the children and guided them when they worked;” and “I provided many opportunities for children to work in small and flexible groups that the children informally created.”

A Success For Life classroom requires a teacher who is knowledgeable and who implements the curriculum in an efficient and well-orchestrated manner. At the same time, flexibility in the unfolding of the hours, days, weeks, and months is essential because the children’s learning may lead in directions not predicted. Thus, it is important for the teacher to have broad and general goals in mind while responding to the specific learning needs of the children. Three teachers indicated that they were able to design teaching that took place at the same or different times, and that this allowed learners to participate at the same or different places. The three teachers determined that interpersonal interaction in learning permits the opportunity for learners to interact with one another and their teachers about the activities. This offers the opportunity for students

to gain the motivational support of their classmates and teachers and encourage the development of judgment and participation in problem solving. One teacher stated, “Young children could learn through a variety of activities. These various activities should contribute to learning, whether they include practical experiences in producing materials, brainstorming, camping, or outdoor experiences.” The teacher gave examples of such class activities. The teacher showed the children’s artwork which made by gluing corn seeds in a variety shapes on to white paper. The teacher indicated that students were asked to brainstorm the use of other kinds of seeds in their artwork. Children gave examples of using nuts, green peas, and red beans instead of corn seeds. The teacher stated, “Preschoolers could extend their thoughts through these activities.” Another teacher stated,

I prepared tempera paint to a thin consistency and place several colors of paint in spray bottles. Then, I allowed children to spray paint paper hanging from an outside easel and encouraged children to share ideas about their artwork. Children need to experience their creativeness in a climate of acceptance. As children experience success with their creativity, they become more comfortable and confident with themselves.

One early childhood professional stated that teachers should provide students with a simple preliminary experience in practicing the skills of self-directed learning. Four teachers indicated that they assisted the students to understand the teacher’ role as a facilitator. The four teachers stated that they provided the pupils with meaningful experiences in working together collaboratively. Examples of statements included,

Children were divided to small groups of five students. They were asked to measure three items, including a big book, a pencil, and a cup. They could use any kinds of measurements to measure the length of each item. I asked children which the longest one and the shortest one were. One child used his fingers to measure, whereas another child used the ruler instead. There was neither right nor wrong. The children must help each other to get the answers.

One teacher stated, “I teach cooperative group skills and assign each group member a role and task and have children complete a group project.” Another teacher stated, “I play 20 questions. I think of a secret topic and have children ask 20 yes/no questions to solve the mystery topic. Children help each other to find the answers”.

Findings indicated that teachers’ roles that were addressed in the *Success For Life* curriculum developed in the United States paralleled to the Thai teacher’s roles at the preschool level. Teachers’ roles include guiding and directing children’s learning, supporting academic growth and real-life applications to life and work, preparing the environment and selecting learning materials to assure the good use of their and children’s time. Examples of respondents’ statements include: “Teachers’ roles in *Success For Life* are not different from the Thai teachers’ roles;” “As a teacher, I provide direct instruction, but I must decide when it is appropriate to do so;” “I think each teacher is a juggler who is more likely to take children’s needs and interests. Such juggling requires that the teacher be willing to play several roles at once such as a facilitator, an instructor, a manager, an observer, and an evaluator.”

Results indicated that the *Success For Life* teachers' roles parallel to the Thai teachers' roles. The roles include guiding instructional process and directing the learning setting by preparing the environment and selecting learning materials to assure the good use of their and children's time, spending a majority of time on instructional activities, and respecting the individuality of each child.

1.7 Assessment

The Child Evaluation Measure-Revised (CEM-R), which was developed by Deborah Hammond Atkins and Katherine T. Kelly (Atkins & Kelly, 2000), is assessment measure for evaluating preschool children's (ages 3-5) development and academic achievement in Literacy, Reading, Mathematics, Science, Music Education, Creative and Visual Arts, Technology, Character Education, Wellness and Healthy Living, Social Development, Emotional Development, and Physical and Motor Skills. Skills are rated by teachers on a 1-5 Likert scale. For example, score 1 represents that the child does not respond to conversation and text read aloud through questions, comments, and actions. Score 2 represents that the child presents an action approximately 10-20 % of the time. Score 3 represents that the action is in progress, which is approximately 20-50% of the time. Score 4 represents that the action was mastered approximately 50-80% of the time, and score 5 represents that the child responds appropriately to conversation and actions as determined by mastery approximately 80% of the time.

Most Thai preschools use the child-development assessments suggested by the Office of the National Primary Education Commission and the Office of the Private Commission as guidelines. Each preschool accommodates the assessments to suit the

school's philosophies and curriculums. When *Success For Life* was introduced to the preschool in Thailand, respondents stated that the Child Evaluation Measure- Revised (CEM-R) reflected individual academic achievement and was designed to evaluate elements of learning. Fifteen respondents felt that Child Evaluation Measure-Revised (CEM-R) was appropriate to use in the preschools. The Child Evaluation Measure-Revised (CEM-R) was implemented with students to comply with goals for each. Examples of the statements were "The Child Evaluation Measure-Revised is appropriate to use with Thai preschoolers." "I don't see anything wrong with using the Child Evaluation Measure-Revised in the Thai preschools." One respondent indicated that teachers needed the specific training on how to use the Child Evaluation Measure-Revised (CEM-R) before assessing and evaluating young children's development. In addition to helping in instruction and curriculum decision making.

1.8 Critical Thinking

Critical thinking skills figure prominently among the goals for education proposed by early childhood professionals, early childhood administrators, teachers, and parents. Eight of twenty-two respondents, including three early childhood professionals, three preschool owners and two directors, indicated that the Thai education system had changed teaching and learning strategies during the past three decades. The eight respondents indicated that the *Success For Life* activities, which supported children to create critical thinking, is applicable to the preschool level in Thailand. Examples of respondents' statements included "The *Success For Life* curriculum responses Thai

parents' and teachers' growing demands that schools must shift their teaching focus from memorization to encouraging pupils to think and self-learn." The professional stated,

The idea of the a child-centered approach is appropriate in fostering children to be able to think and to do, but it is hard for teachers to implement. Although there have been many guides supporting the child-centered-approach ideas, most teachers have not been able to implement theory into practice.

Another professional suggested, "I think early childhood professionals should provide teacher training on how to help children develop thinking skills." The professional indicated that the idea of supporting young children to think aligns with children's roles in the *Success For Life* mission. The professional continually stated,

Learning was the organization of a process of interaction between teachers and learners, providing an ambiance, environment and activities which created knowledge. At the same time, young children are given training in all aspects, including physical, verbal and mental, in facing situations, and in problem solving through logical and analytical thinking. To learners, a desirable learning process will result in the creation of knowledge, thought, capability, and virtue.

Moreover, preschool owners and teachers indicated that they were interested to know more about how to encourage and support the potential of young children to be able to think and do. Findings disclosed that the *Success For Life* activities, stimulating children to create critical thinking, parallel to the needs of early childhood professionals, teachers and families. The eight respondents indicated that the educational system in Thailand was

concerned with ensuring that schools adjust rapidly to the new demands of the emerging knowledge society and economy. One teacher stated,

The challenge is to ensure that all students exiting preschool are able to communicate effectively, are autonomous learners and problem solvers, and have the attitudes and capabilities needed to contribute to the creation of a cohesive society and a vibrant economy.

The teacher stated, “In response to growing demands from parents, the teachers must shift their teaching focus from memorization to encouraging pupils to think and self-learn.” Results indicated that the *Success For Life* mission, which supports children’s critical thinking, is applicable to use in preschool level in Thailand.

1.9 Teaching strategies and ideas for activities

Effective teachers actively instruct students by demonstrating skills, explaining concepts and assignments, conducting participatory activities, and acquiring knowledge and information that contributes to students’ learning. After teachers received the *Success For Life* training, participants gained an understanding of brain research and its relationship to how children learn. Teachers applied the knowledge to their classrooms. Six respondents indicated that teaching strategies and ideas for activities applied to the preschool level in Thailand. Four respondents, including three teachers who implemented *Success For Life* in their classes and one preschool owner, indicated that their students improved literacy skills after they completed the training on brain research and learning. Teachers stated that since their preschoolers came from different backgrounds and had different learning styles, they determined the student’s knowledge base by asking

students to contribute what they knew. One teacher gave an example of the *Success For Life* activity that was applied successfully. First, students experienced the literacy activities provided on every Monday where they were asked to draw a picture of what they learned and to write a sentence describing the picture. Then, the teacher bound the children's work and had the children read the sentences everyday. The teacher revealed that the children increased their language comprehension and reading skills. The *Success For Life* curriculum indicated that this activity, is indicated in the *Success For Life* curriculum, connects to brain research. The Wernicke's area that is located in the parietal lobe is used for understanding language. Children's language and literacy skills develop as their vocabulary increases.

As children with special needs are increasingly placed into regular classrooms, the need for qualified teachers is growing. Two early childhood professionals indicated that effective teaching was structured and focused on the learning needs of each student in the class. This premise incorporates information about young children's background, capability, and interest. The first professionals suggested that the *Success For Life* training should guide the teachers teaching strategies for children with learning disabilities. Another professional suggested, "The *Success For Life* training should provide information about teaching techniques for children with different learning styles and children in the English as a Second Language (ESL) program." Examples of statements included: "Many parents in Thailand send their children to the school in the hope of improving their children's English skills. I think teachers need to learn about the brain research findings that related to studying English as a second language;" and

“*Success For Life* should train teachers about techniques to teach young children with different learning styles.”

Findings revealed that the *Success For Life* teaching strategies and activities are appropriate to use in Thai preschools. Six teachers were satisfied after using the *Success For Life* activities in their classes. They all indicated children’s improvement in literacy skills.

1.10 Computer and technology

Computer and technology is one of eleven subject areas in the *Success For Life* curriculum. The purpose of the computer and technology curriculum is to promote preschoolers to 1) use a variety of input devices, such as a mouse, a keyboard, a printer, and CD-ROM. 2) learn technology terminology and data input skills. 3) use a variety of software packages with audio, video, and graphics to enhance learning experiences, and 4) learn to follow oral or pictorial cues for operating programs.

Five of eight *Success For Life* sites provided computer experiences for young children. The students used computers for drills and for playing games in math computation and language arts. Teachers reported that children used computer programs to construct stories with pictures, labels, recordings, and to compose and illustrate stories. Examples of respondents’ statement included “Children use microworlds or programs that help them discover concepts and cause-effect relationships. The computer serves as a bridge between hands-on experiences and abstract learning.” “I allowed children to play computer games because I think that computer games encourage learning and problem

solving through motivating activities that resemble video games.” “Technology allows preschoolers to confront complex problems and to develop problem-solving skills.”

Five respondents indicated that the component of computer and technology in the *Success For Life* is appropriate to use in the preschool level in Thailand. One director stated,

The new information, communication technologies, and global telecommunications will penetrate all aspects of life and will transform the way Thais live and work. Technology is generating a great demand for people who are flexible, life-long autonomous learners and problem-solvers. I think preschoolers should learn and experience to use computer and technology.

One preschool owner stated,

My preschool has a computer lab. Teachers teach young children basic computer skills, including eye and hand coordination and computer vocabularies, such as a mouse, a screen, and a keyboard. Children should learn about the basic use of the computer and technology since they are young.

Another teacher stated,

I agree with the *Success For Life* curriculum that the computer and technology is important for young children. I think preschoolers should learn and get familiar with a computer. However, my school doesn't provide enough computers for every child. Two pupils share one computer. So a computer is used as a means of providing learning experiences for a small group.

Five respondents, including three early childhood professionals and two preschool owners, indicated that technology instruction would be required of preschools in the future. Two respondents stated that technology usages are increasing rapidly. One respondent indicated, “Technologies, such as internet, email, and videoconference, allow administrators and teachers to communicate and access new educational information. In addition, the computer permits preschool children to practice using eye and hand coordination.” The early childhood professional stated, “I agree with the *Success For Life* curriculum that preschool students should be familiar with the use of computer. At least, young children should know computer devices and have basic skills to use them.” The owner stated,

The use of computers grows in early childhood education in Thailand. Many preschools have computers and permit young children to experience simple software. Children can create shapes, colors, sounds, and movement in the program. I agree that the computer and technology curriculum is appropriate to use in the preschool level.

1.11 Class size

In general, in Thai preschools, there are between thirty and forty students in a classroom each year. The findings from the present study showed that the school administrators and teachers agree with the *Success For Life* program that small groups of students in one class allow children to actively participate with teachers. However, preschool administrators indicated that they could not reduce the class size because they did not have financial support from the government.

Five respondents, including one preschool owner, one director, and three teachers, indicated that children in the classroom should work in small groups with others in completing tasks and projects. One respondent stated, “With more time for each child, increased understanding, and a more exciting curriculum cause children to respond more positively to teachers.” Three respondents, including two preschool owners and one director, indicated that, although they understood that learning in smaller classrooms is more effective than larger ones, financial constraints control the class size. They could not reduce the number of students in each classroom as the *Success For Life* program suggested. The owner indicated that preschools did not receive financial support from the government. Thus, the more students who were registered in school, the more income was earned.

Results from the questionnaires indicated that respondents learned from the *Success For Life* training that a small class size allows teachers to work closer to children than the larger class size. The director stated, “I understand that the class size impacted the children’s development and achievement, but I could not lower the class size.” The owner added,

I could not shrink the class size but I solved problems by supporting teachers to develop their professional qualities. I sent teachers to receive training. The teachers who took the training would educate and guide the teachers who did not attend the training. Teachers are assigned to take turns in training attendance.

In addition to supporting the professional development, one preschool owner solved the problems of shrinking a class size by breaking young children into small groups. The owner stated,

The classroom teacher divided children into five smaller groups. Each smaller group, which consisted of five or six students, is doing activities that the teachers assigned to do in a group. Each group is assigned to do different activities. The teacher allows students to do each activity for five minutes. Then, the teacher gives a signal by ringing a bell so that the students know that they have to change a group.

1.12 Community involvement

Brain and neuroscience findings bring national attention to the significance of early years of life and encourage community involvement in the development of children. Early childhood professionals believe that communities, private organizations, professional bodies, religious institutions, enterprises, and other social institutions should work collaboratively. There are a variety of forms of community involvement, including providing financial support to early childhood programs, and volunteers to teach young children in class. Five respondents, including three preschool owners and two early childhood professionals, indicated that community involvement that is one of the *Success For Life* efforts is applicable to preschools in Thailand. One respondent stated, “Developing strong partnerships among schools, families, businesses, and community and religious groups is the best way to make our educational system thrive.” The five

respondents indicated that community involvement allows learners to collaborate closely with communities. One owner addressed,

Teachers offered ideas to take young pupils on field trips. Students were taken to countryside to learn how to grow rice. The farmer taught them how to grow rice and corn. Then, students were allowed to grow rice in the classroom, measured the height of rice, and learned the needs for making rice grow.

The three preschool owners stated that parents and community members come to value and respect teachers' efforts and were more likely to speak positively with others about early childhood programs. The owner indicated that with added assistance, teachers could also do a better job in their teaching. Bringing in other adults with unique talents and abilities also adds to the excitement of the classroom and often leaves teachers feeling more satisfied with their work. In addition, two preschool owners indicated that, as teachers involved with parents and community members, their relationships with children tended to improve.

Research question 2: To what extent does *Success For Life* align with public policy in Thailand?

When a new program is first developed in its native country (i.e. the United States) and then introduced to another country (i.e. Thailand), issues of public policy are a concern. Table 4 presents the contents or areas of *Success For Life* that aligned with the Thai public policy. The results show that the teacher training and staff development, educational objectives, and family and community involvement aligned with the Thai public policy.

Table 4

The contents in *Success For Life* aligned with the public policy in Thailand. (N=22)

Contents	frequencies	% of agreement
1. Teacher training and staff development	22	100
2. Educational objectives	15	67.5
3. Family and community involvement	5	22.5

The Thai Education Act (1999) serves as master legislation on education of the country, leading to significant education reform, the major tasks of which are:

1. Learning reform, which will follow the guideline and spirit of the provisions in the Act by attaching highest importance to learners. The learning reform focuses on learner-centered teaching-learning process, allowing learners to develop at their own pace and in accord with their potential. Teachers support learners in learning.

2. Reform of educational administrative structure includes developing the teaching profession through reorganizing the system for teachers and faculty staffs.

The National Education Act (1999) indicated that education would aim at the full development of the Thai people in all aspect, including physical and mental health, intellectual, knowledge, morality, integrity, and desirable way of life so as to be able to live in harmony with other people. In addition, education would give emphases to morality, learning process, and integration of the knowledge about oneself and the relationship between oneself and the society. Furthermore, education should accentuate scientific, technology and skills of technology, religion, art, culture, sports, mathematics,

Thai languages, and skills in leading a happy life. The followings are examples of quotes and additional reports answered by respondents identifying the category of the *Success For Life* contents that meets the Thai public policy.

2.1 Teacher training and staff development

The quality of the classroom teacher is important ingredient for student learning. All (100%) interviewees indicated that the *Success For Life* program provides teacher training which complies with the Thai Education Act (1999) promoted by the Ministry of Education in the development of a system for teachers and educational personnel. This promotion included production and further refinement of categories of personnel and further enhancing teaching to become a highly respected profession.

Three preschool owners suggested that the early childhood education program should require student teachers' complete one year of classroom teaching experience before being a licensed as a teacher. The three respondents indicated that increasing a period of teaching experiences allowed prospective teachers to understand the nature of young children and be able to solve problems occurred in the classroom. One owner revealed that expected educational background of the teacher should include at least the completion of a bachelor's degree in early childhood education, child development, or related educational areas. Another preschool owner stated, "The *Success For Life* training promotes teaching as a profession and raise the quality of teachers and staffs. The professional development, which is one of the *Success For Life* efforts, parallels to the Thai Education Reform."

Results indicated that the professional development must be intensive and teachers must have the opportunity to bridge what they learn into practice. The findings also revealed that the *Success For Life* training supports the National Education Act in which that promotes the staff development.

2.2 Educational objectives

Success For Life integrates human development and neuroscience research into early childhood practice. In addition, *Success For Life* provides enriched educational environments that support academic skill development in reading, science, mathematics, music, and the creative arts. Children will experience the cognitive, linguistic, socio-emotional, physical, artistic, and behavioral skills necessary for successful learning and living. Table 5 presents the objectives of the Thai Education Act (1999) and the *Success For Life* program.

Table 5

List of objectives of the Thai Education Act (1999) and the *Success For Life* program.

Objectives	Thai Education Act	<i>Success For Life</i>
1. Supports academic and life success	✓	✓
2. Promotes development for teachers and educational personnel.	✓	✓
3. Promotes partnerships with families individuals, and communities.	✓	✓
4. Enables individuals to learn at all times and all places	✓	✓

Objectives	Thai Education Act	<i>Success For Life</i>
5. Promotes literacy development and reading	✓	✓
6. Supports readiness activities that prepare children for success for school and life	✓	✓
7. Supports teacher guided learning activities	✓	✓
8. Promotes the learners' performance assessment through observation of their development, personal conducts, learning behaviors, and participation in activities	✓	✓
9. Encourages high levels of thinking	✓	✓
10. Enhances character development	✓	✓
11. Recognizes and supports individual children's strength and unique differences	✓	✓
12. Emphasizes academic learning within the context of an enriched environment	-	✓
13. Promotes family education and involvement.	✓	✓
14. Provides young children the opportunities that will enable them to participate in the American Dream (i.e. to develop social developmental and educational skills for participation in democratic society) and Thai Dream (i.e. to develop academic skills, think critically, and to live in harmony with others).	✓	✓

Note. ✓ = presented; Dashes = did not presented

Fifteen (67.5%) respondents agreed that the *Success For Life* missions aligns with the Thai Educational Act (1999). One early childhood professional stated,

This *Success For Life* principle appears to satisfy much of the National Educational Act. The National Education Act (1999) notes that education should aim at the full development of the Thai people in all aspects: physical and mental health; intellectual; knowledge; morality; integrity; and desirable way of life. Likewise, the *Success For Life* mission provides curriculum that supports academic skill development in reading, science, mathematics, music, and arts. In addition, *Success For Life* provides skills necessary for success learning and living.

However, another early childhood professional stated that the *Success For Life* curriculum did not provide much information about moral development addressing the characteristic traits of responsibility, respect, honest, and selflessness. Another professor stated, “Both the *Success For Life* program and the Thai Education Act (1999) aim to support academic learning.”

2.3 Family and community involvement

The National Education Act (1999) states that strong family and community involvements foster a child’s success and happiness. Five respondents, including two early childhood professionals and three preschool owners, indicated family and community involvement component in *Success For Life* appears to satisfy much of the Thai National Education Act B.E. 2542 (1999). The Act stated, “Local administration, organization, families, communities, community organizations, and religious institutions

should work collaboratively and mobilize resources for education, donate properties and other resources for educational institutions and share educational expenditures as appropriate and necessary (Chapter 8 Section 58).” The five respondents revealed that family involvement, which was noted in the *Success For Life* curriculum guidelines, agrees with the Thai Education Act. A preschool owner indicated that teachers adapted some *Success For Life* activities by allowing children to gain direct experiences from community resources. The owner gave the example of “How a seed becomes a plant” (Week 10, lesson C in the *Success For Life* science curriculum) activity. The owner stated,

Teachers took students to a farm in order for them to be taught the concept of a plant cycle. The farmer explained and gave the students information on how to grow rice. The students were allowed to grow green beans in a small cup, observed the plants growth, and measured the height of bean plants. In addition, young learners learned the growing needs of plants.

Four participants emphasized that parents and community members came to value and respect teachers’ efforts and were more likely to speak positively with others about early education. Teachers could also do a better job in their teaching when they receive assistance from parents and community. One early childhood professional expressed that bringing in other adults with unique talents and abilities add to the excitement of the classroom and often leave teachers feeling more satisfied with their work. The first preschool owner stated, “I believe that children will get benefits for their education when teacher, parents, and community collaborate.” The second preschool owner added, “The

Success For Life component of family and community involvement parallels to the Thai Educational Act. As teachers involve with parents and community members, children's learning tends to improve." The third owner stated, "*Success For Life* agrees with the Thai public policy. Everyone must join hands to help young children's learning."

The mission for the family and community involvement is to promote children's learning through the development of family, school, and community partnerships.

Success For Life puts effort to advocate the involvement of families in their children's education and to promote relationships among home, school, and community that can enhance the education of all children. Respondents indicated that that the family and community involvement indicated in *Success For Life* meets the National Education Act's recommendation.

Research question 3: To what extent does *Success For Life* align with Thai culture?

The respondents were asked question: To what extent is *Success For Life* comply with Thai culture? Table 6 presents the responses for the questions.

Table 6

Contents in the *Success For Life* program that aligns with Thai cultures. (N = 22)

Contents	Frequencies	% of agreements
3.1 Children's roles	7	31.5

Table 6 shows that the 31.5% of respondents indicated that the content of children's roles aligned with Thai culture.

3.1 Children's roles

According to children's roles in *Success For Life*, children demonstrate positive character traits such as patience, courtesy, responsibility, and respect. Seven participants, including two preschool owners, two directors, and three teachers, indicated that Thai children learned about themselves and the relationship between themselves and society: family, community, nation, and world community. Respondents emphasized that children were educated in a sense of respect for themselves as well as others. In the Thai culture, people are supposed to devote themselves to the group which they belong to rather than doing anything for themselves. Moreover, seniority is significant in the community. One respondent stated, "The concepts of self-respect and respect seniors should be integrated in the preschool curriculum." One teacher gave an example of "Guess what I Am?" activity which allowed children to understand the roles, responsibilities, and services provided by community workers. The teacher stated that this *Success For Life* activity enhances children's development of a sense of responsibility and enables children to effectively participate in class and community." Another teacher mentioned the example of the activity of "Clean Up Our School". The teacher indicated that the students worked together to clean up the school grounds. The teacher also stated that young children should learn their responsibilities to the school community. Two respondents indicated that parents were invited to involve with the class activities by presenting about their careers. Findings revealed that *Success For Life*, indicating children's roles to display positive characteristics, such as responsibilities, cooperation, courtesy, honest, and

respect, paralleled children's roles that were expected in Thai cultures. Thai children were taught to be responsible, respect seniors, hostness, and selflessness.

Research question 4: What changes to *Success For Life* are necessary to comply with educational system and culture?

This question allowed the participants to recommend what *Success For Life* for a change to conform to Thai educational system and culture. Table 7 presents modifications that *Success For Life* needs to make in order to comply with Thai educational system and culture.

Table 7

Changes that *Success For Life* needs to make in order to comply with Thai educational system and culture. (N=22)

Contents	Frequencies	% agreement
4.1 Teacher training and staff development	8	36
4.2 Curriculum	6	27
4.3 Child-centered approach	5	22.5
4.4 Children's rights	3	13.5
4.5 Classroom research	2	9

The followings are examples of quotes and additional reports answered by respondents identifying the category of modifications *Success For Life* needs to make to meet Thai public policy, educational, and Thai culture.

4.1 Teacher training and staff development

The *Success For Life* teacher training educates teachers about brain research and its implications for teaching and learning, trains teachers in developmentally appropriate

practices, helps teachers develop skills to create enriched and stimulating environments for young children, and trains teachers to develop sensitivity to children's learning needs. All respondents indicated that the teacher training was useful for participants. Teacher training provided expertise that increased the knowledge of children's growth, neuroscience research and the applications to children's learning. One teacher stated, "The teacher training is beneficial. I learned about the child's development and the brain research." Another teacher indicated, "I gained knowledge from various disciplines." The One director stated, "The *Success For Life* teacher training has contributed to the professional development. My teachers and I have more knowledgeable about new research on the brain and information relating to how children grow and learn." Results showed that teachers were eager to gain more current brain research, brain parts, brain's functions on children's learning and children with different learning styles, as well as techniques to help their young children to learn such as the infinity walk. Eight respondents suggested *Success For Life* modify contents by including contents of activities to enhance children's critical thinking, activities for children with special needs, and activities for children with different learning styles. One preschool owner suggested including the Child Evaluation Measure-Revised (CEM-R) in the training. Two respondents indicated that the *Success For Life* training should include children in the English as a Second Language (ESL) program. The owner stated,

The rapid increase in the number of international schools in Thailand has cast doubt on whether teachers are qualified. I would like to suggest that the *Success For Life* teacher training should contain the contents that are for children who

study in the English as a Second Language (ESL) program.

The owner indicated, “The pupils with special needs are given instruction in the regular classrooms. Teachers should receive a training on how to teach and take care of disabled students.” Three respondents reported that the *Success For Life* training should include the contents of teaching strategies for young children with different learning styles.

Examples of the statements included “Children differ in the learning styles. Teacher should understand styles of learning and know teaching techniques to help each child develop learning in a full capacity.” “Every child possesses several distinct learning traits. Some children learn better when they learn by themselves whereas others learn better when they work with their classmates. Teachers should be trained about teaching techniques for children with different learning styles.”

4.2 Curriculum

The *Success For Life* curriculum, including subjects of Literacy, Mathematics, Science, Music, Art, Dramatic Play, Health and Safety, Physical Development, Technology, Social Study, and Character Education, guides activity-planning formats for teachers to set the stage for varied and multiple experiences. Respondents revealed that in general, the *Success For Life* curriculum was appropriate to use in preschool in Thailand. However, six respondents suggested that the *Success For Life* curriculum should be modified minor pieces so that the curriculum would be more effective to use in Thailand.

The early childhood professional indicated that when implementing *Success For Life* in different regions in Thailand, teachers should adapt the curriculum and activities to match with local cultures and traditions. For example, children who live in the South

of Thailand are probably interested in the life of fisherman, whereas those in the North of Thailand are more likely to find a study of hill tribes more relevant.

Three respondents indicated that Thai is an official language, but there is a variation in the particular forms that are used, depending on the family's background, geographic location, and educational experiences. Participants suggested that teachers should adapt literacy activities to comply with the local language used. They gave an example of children who live in the North use the word "Jao" at the end of sentences to make the sentences sound polite. Children who live in other regions used "Ka" instead. Further, the syntactic structure of Thai has some important differences from English: word order (e.g., adjectives are placed after nouns); there are no articles; tense is not indicated by changes in verb form; plurals are not indicated by change in noun form; there are no auxiliary verbs or used of the verb to be followed by an adjective, so that *I am tall* in Thai is written *I tall*. Teachers in *Success For Life* must adapt the curriculum and activities to match with these cultural conditions.

Five respondents suggested that *Success For Life* should include activities for children with special needs, children with diverse learning styles, and children in the English as a Second Language (ESL) program. Examples of statements were "Teachers know each child well. As they work with children, they take into account individuals' differing abilities, developmental levels and approaches to learning. I think *Success For Life* should add activities that are appropriate for children with different learning styles." "There are children with different strengths in the classroom. Teachers should understand individual difference and know the techniques to teach young children." "All children

could learn, could succeed, and, that all children had strengths. I think *Success For Life* should provide activities for children with special needs.”

I use different lessons and teaching methods for children with regard to differences in children’s prior experiences, how individual children learn best, how much and what kinds of structure they need, and other individual characteristics. However, I need a guide to help me for teaching techniques.

Children bring these strengths to school and educators must realize and accept to these children’s strengths as potentials in learning. Preschool owners and teachers agreed that *Success For Life* should focus more on children whose abilities and capabilities are different. The teacher stated, “Some children learn through vision, some learn through tactile, and others learn through smelling. *Success For Life* does not mention activities that were appropriate for children with diverse learning styles.”

In addition, six respondents suggested that moral and ethics education should be integrated in the *Success For Life* curriculum. One preschool owner stated,

Thai society is proud of its identity. The country opens and has been able harmoniously to adapt external cultures to its own way of life and its own unique environment. It is generally a peaceful and caring society where violent conflicts are noticeably absent. Moreover, the Thai people adhere to religious principles based on rationality and moderation. I think the *Success For Life* curriculum should add moral education, including the concepts of sharing and cooperating with others, respect, honest.

One early childhood professional indicated that books and materials should match with the Thai social, cultures, and values. The preschool owner added, “*The Success For Life* should contain story books that aimed to teach young children moral development” as well. The teacher stated, “I wrote a story book that aimed to teach young children a selflessness. I think that children should be trained moral education through listening the ethical stories.” The preschool owner stated,

In the past two decades, advances in information technology had brought about rapid globalization, and this dictated a need for the formulation of new world economic and social orders and for the re-evaluation of international relations. All of the factors give rise to both opportunities and challenges for sustainable development of Thailand. On the positive side, globalization has expanded world markets, leading to greater mobility of production factors and increased trans-national investment. Globalization has also accelerated the transfer and utilization of technologies for development. Furthermore, the Thai people will have a wider access to various types of information, suited to the requirements and interest of each individual. They also have the opportunity to obtain and evaluate data and information in their own homes through computer networks and other electronic media. The growth of the private sector and more direct access to information by each individual enables decentralization of power to local areas and creates increasing pressure to conserve local cultures. On the other hand, the influence of foreign cultures and the use of foreign information by existing media in various forms, such as advertising and recreational activities, without proper scrutiny may

well result in the promotion of undesirable values based on materialism, consumerism and extravagance among new generations. Therefore, young children should be trained about moral education and financial education.

In February 2001, George S. Morrison, the *Success For life* founder, was invited to present and educate families at two preschools in Bangkok. Families supported the preschool owners' statements, which indicated that the *Success For Life* curriculum should include moral education and financial education. One respondent stated, "Moral education and academic learning must not be conceived as separate spheres, rather there must be strong and mutually supportive relationship." The owner added, "We read the news often that some smart children are aggressive. These children may study hard and may not be trained to behave. I think children should be educated both academic and moral education." The families suggested that teachers should provide crucial aspects, such as financial management and material saving, to the students. Furthermore, moral education should include the contents of selflessness, responsibility, honest, economy, sportsmanship, and collaboration.

Results indicated that the mathematics curriculum in *Success For Life* should be modified. Four respondents revealed that they expected young learners to develop mathematics skills higher than the *Success For Life* mathematics curriculum's goals. The respondent stated, "My students were taught to count from one to one hundred but the *Success For Life* curriculum suggested the preschool children to count from zero to twenty." One preschool owner commented, "The *Success For Life* mathematics curriculum includes the lesson of zero and the value of zero, but Thai early childhood

curriculum excludes the concept of zero. Some children may not understand that zero means there are none.” The owner agreed with the *Success For Life* mathematical curriculum that children should comprehend that zero is in the mathematical system and it has no value when it stands alone. Four respondents indicated that Thai preschoolers learn adding and subtracting by the time they are five years old. Teachers use manipulative objects to allow children’s grasp calculating concepts. In addition, young children have practiced calculating and doing numerous mathematical exercises. One respondent stated, “Children ages between 5 and 6 years can count by ones to fifty or higher. They can also add numbers in one digit. The *Success For Life* should increase a higher mathematical concept level” An early childhood professional indicated that mathematics could be taught as a series of procedures and rote memorization tasks. Unfortunately, this approach fails to make mathematics meaningful and interesting to children. The professional continually stated,

When teachers demonstrated the usefulness of mathematics in real-life situations, such as computing money to buy fruits, children could see the relevance of their learning and get excited about mathematics. Similarly, reading has little value until these skills can be applied to written topics that are interest to children and that they want to know more about.

Coordination and design of curriculum contributes positively to the administration of the school operation. Three respondents indicated that The *Success For Life* curriculum should be rearranged in sequence from easier levels to more complicated ones. Suggestions by respondents strengthen the *Success For Life* curriculum for Thai

preschoolers. In addition, two respondents indicated that the *Success For Life* social studies curriculum should be modified so that some lessons and activities match with Thai cultures, Thai society, and Thai geography. One teacher stated, “The four seasons activity should be changed to three seasons for the reason that there are only three seasons in Thailand: Winter Summer and Rainy.” Another teacher indicated,

Thai children plays, such as Ree Ree Kao Sarn and Mon Son Pa, should be integrated in the curriculum so that young children would be familiar with Thai plays. Four respondents indicated that social studies curriculum should contain the content of the national and religion holidays.

Furthermore, the teacher stated, “Children from different regions should learn their local cultures. There are four major dialects and subcultures within Thailand. Teachers must adapt the *Success For Life* curriculum to match local cultures and languages.” The teacher continually stated, “Thai customs and the way of thinking came from Buddhism. Therefore, young children should learn the practice of Buddhism and customs of Thais such as offering food to monks, paying respect to Buddha images, praying, and meditating.” Three respondents recommended that the social studies curriculum should include the content of national religious holidays. One professional indicated, “The *Success For Life* curriculum should include the importance of the national religious holidays and the rituals.” One director added, “The lesson of the national religion holidays allows students to learn the history of the religion holidays and activities that Thais do in Thailand.” Early childhood professionals and owners felt that westernize culture had gradually changed the Thai authentic living style. The professional stated,

“Thai society was transformed rather abruptly into a semi-industrialized one. The citizens were not allowed enough time to digest the new cultural diet and fully extract those nutrients most suitable to the Thai context.” The preschool owner added,

Culture change is unavoidable but Thais should decide on our own to adopt and adapt that which benefits us all. The new cultural environment should be one in which citizens are not just materially satisfied but are spiritually fulfilled from performing deeds for the public good and appreciation of art and culture.

The teacher suggested that Thai classical performance should be included in the music curriculum. Thai children should have a sense of Thai music and Thai classical dance appreciation.

In conclusion, there were six respondents indicated that the *Success For Life* curriculum should be modified. The mathematics curriculum should be modified to a higher concept level. The social studies curriculum should modified the contents to match with the Thai social and cultures. The *Success For Life* curriculum should include moral education such as characteristic traits of responsibility, cooperation, honest, and respect. In addition, the *Success For Life* courses of study should include the financial education addressing concepts of value of money, spending, and saving.

4.3 Child-centered approach

Learning reform is at the heart of the National Education Act (1999). Learning reform is essentially a shift from focusing on subject matters to learners (Office of the National Education Commission, 1999). The participants’ concern of the term that *Success For Life* indicated was different from the one that suggested in the National

Education Act. Five participants, including three early childhood professionals and two owners, indicated that the *Success For Life* curriculum should change the term “teacher-centered” to “teacher-directed-child-centered” in order to parallel the National Education Act of B.E. 2542 (1999). One participant indicated that the Thai Education Act (1999) noted that learning reform emphasizes a high importance on learners. Therefore, the terminology should use “child-centered” instead of “teacher-centered.” Questionnaire results indicated that teachers better understood the terminology of “teacher-centered” and “child-centered” after they received the teacher training. Five participants agreed with the team of *Success For Life* that “teacher-directed-child-centered” was a more appropriate use than teacher-centered. The terminology of teacher-directed-child-centered approach means that initiated instruction along with child-centered activities provide child children the opportunities to expand language and begin problem solving (Brown, 2001). Three early childhood professional commented that even though the National Education Act (1999) had already been in force and the learning reform in accordance with the Education Guidelines could be immediately implemented without awaiting for enactment of the organic laws as required in other chapters, that a number of teachers, administrators, and parents were still unclear about or misinterpret the concept of a child-centered approach. This concept results in confusion at present. One early childhood professional stated, “This is giving us a big headache as teachers could become a major obstacle to educational reforms. We need to make them understand the concept of a child-centered approach and a new teaching style quickly.” Finally, the three professionals emphasized that the terminology “teacher-centered” in *Success For Life*

must either be clarified or changed to “teacher-directed-child-centered” so that the term agrees with the definition in the National Education Act. One professional stated,

Like any changes in a society, education reform is fraught with dangers.

Success For Life should define the terms of a teacher-centered approach, a child-centered, and a teacher-directed-child-centered approach and train teachers teaching techniques to enhance the teacher-directed-child-centered approach.

Another professional stated, “The terminology of a teacher-centered and a child-centered are confused to teachers. The *Success For Life* curriculum should define the two terminologies clearly.”

4.4 Children’s rights

According to the *Success For Life* beliefs about children and families, every child has the right to access and participate in the American Dream. Three participants indicated that the children’s and family’s rights should access to the Thai Dream instead of the American’s. Results revealed that the Thai Dream includes child’s development in physical, emotional, social, intellectual, spiritual, and characteristics traits, such as respect, honesty, and selflessness. Furthermore, children should enjoy coming to school. Examples of the statements included: “Children should be trained a moral education such as the character traits of respect, honest, and tolerance since early years of age. I think moral education helps reducing children’s aggressive behavior;” and “*Success For Life* should include the course of moral study because the moral and ethical forces resolve children’s behavioral problems.”

I think Thai children now run the risk of adopting Western culture and losing Thai culture. I just think that's an issue that teachers, parents, and communities really need to pause and think. I want to see young children respect seniors and help each other.

“Teachers should teach children the characteristics traits of selflessness. When children see teachers carry bags, they should learn to offer a help.” “The present world crisis is due to the abandoning of spiritual development, leaving only material obsession. I believe that moral education teaches children to be good persons.”

The children’s rights, which stated in the *Success For Life* curriculum that every child has the right to access and participate to the American Dream, should be changed to the Thai Dream. The Thai Dream includes developing academic skills, thinking critically, and developing characteristics traits.

4.5 Classroom research

The need for qualified teachers for young children continues to increase. The characteristics of a good teacher include creativity, flexibility, sensitivity, and curiosity. The present study findings suggested the *Success For Life* teachers conduct classroom research. Two respondents, including one preschool owner and one director, indicated that the *Success For Life* teacher training should add the knowledge of conducting classroom research. The classroom research supports the Thai Education Act guidelines which indicated that teachers should be enthusiastic to gain new knowledge. The owner indicated, “*Success For Life* is a neuroscience research-based program. Teachers should be able to conduct classroom research and develop themselves by conducting classroom

research. Classroom research contains studies of children's development and children's learning in the classroom." The director stated, "I think teachers should be able to conduct the classroom research because it supports *Success For Life* and the Thai Education Act." The owner revealed, "Teachers should always develop themselves by conducting classroom research. Classroom research helped teachers to be objective about themselves and helped them to make more efficient decisions of class activities."

Two respondents indicated that the *Success For Life* teachers should be able to conduct the classroom research. They suggested that the *Success For Life* teacher training should train teachers how to do the classroom research so that the research findings will support the children's learning.

Research question 5: What components are necessary to develop a model and process for electronic mentoring of teachers involved in *Success For Life* in Thailand?

This question examines the electronic mentoring model in the *Success For Life*. EnVision is two-way audio- visual desktop interactive systems which utilize internet links. EnVision has been used in the *Success For Life* program to enable the extension of educational opportunities to distant locations. Regarding to the present study, mentor teachers in the United States were expected to mentor teachers in Thailand by using the EnVision. Unfortunately, the EnVision had not as yet been distributed to preschools during the period of data gathering.

Twelve participants indicated that electronic mentoring through the EnVision is a beneficial tool that enabled education to move full force toward meeting the high

expectations of the society for the 21st century. In addition, electronic mentoring through EnVision saves the cost of traveling and time.

In February 2001, respondents were invited to attend the EnVision meeting that the director of the *Success For Life* center in Thailand arranged. The purpose of the EnVision meeting was to introduce the use of the EnVision. However, the presentation of the use of the EnVision was unsuccessful because there were unexpected technical problems occurred.

Based on personal interviews, twelve respondents indicated that the EnVision is beneficial to use for mentoring teachers. The twelve respondents expressed that the EnVision saves the traveling cost and time. In addition, the same group of twelve respondents suggested that the teachers should receive the training of how to use the EnVision. One preschool owner stated, "I don't know much about the technology. I want to receive a training of the use of the EnVision." Four preschool owners indicated that they expected to use the EnVision next academic year (June 2001). Examples of the statements included "I hope that teachers in my school can use the EnVision next academic year." "I look forward to discussing about the teaching strategies with the *Success For Life* mentor teachers via the EnVision." "I could discuss directly with the *Success For Life* mentors about teaching strategies."

The professional indicated,

Some barriers emerged and still hindered effective use of the EnVision in schools.

Lack of training, time dissimilarity, and the quality of telecommunication access were reported in the study. The pictures and voices were unclear when the

EnVision meeting was made. In addition, the schools' schedule differences between University of North Texas' and Kasetsart University' as well as time diverse between Texas' time and Thai time enabled a difficulty to arrange the EnVision conference.

Four respondents, including one owner and three teachers, indicated that when teachers have problems regarding the *Success For Life* curriculum, materials, and instruction, the teachers will discuss with their preschool owners, directors, or the director of the *Success For Life* center in Thailand. One teacher stated, "When I can't find the materials suggested in *Success For Life*, I asked the preschool director for advices." Results showed that some teachers were uncomfortable to communicate in English with the mentors and to use technology communication, including e-mail, EnVision, and chat program. Preschool owners and teachers suggested that the EnVision should be provided to each of the *Success For Life* site. One preschool owner stated, "It would have been more convenient if the EnVision had installed at my school. Teachers were able to discuss with the mentor when time permitted."

Summary

There are five research questions that addressed the effectiveness of implementing *Success For Life* in Thailand. First, to what extent does *Success For Life* apply to the preschool level in preschool level in Thailand? Second, to what extent does *Success For Life* align with the public policy? Third, to what extent does *Success For Life* comply with the Thai culture? Fourth, what changes to *Success For Life* are necessary to align with Thai educational system and culture? Fifth, what components are necessary to

develop a model and process for electronic mentoring of teachers involved in *Success For Life* in the Thailand project? Overall, the results indicated that *Success For Life* was appropriate to the preschool level in Thailand. In addition, the participants made suggestions for *Success For Life* so that the *Success For Life* implementation in Thailand would be more appropriate to use in Thailand and agree with Thai National Education Act, Thai educational system, and Thai culture.

CHAPTER V

CONCLUSIONS AND DISCUSSION

This chapter provides a summary of the study, the findings, conclusions, and recommendations for further study. The purpose of this research was to investigate the effectiveness of implementing the *Success For Life* program in Thailand. The research questions were:

1. To what extent does *Success For Life* apply to the preschool level in Thailand?
2. To what extent does *Success For Life* align with public policy in Thailand?
3. To what extent does *Success For Life* conform to the Thai culture?
4. What changes to *Success For Life* program are necessary to conform with the Thai educational system and culture?
5. What components are necessary in order to develop a model and process for electronic mentoring of teachers involved in *Success For Life* in the Thailand project?

In order to answer these questions, a total of forty-six (46) participants, including 4 owners, 6 directors, 32 teachers, and 4 early childhood professionals were requested to complete the questionnaires. The thirty-two (32) teachers included four (4) teachers who had already implemented *Success For Life* in the classroom and twenty-eight (28) teachers who will implement *Success For Life* in the classroom during the next academic year. Each of the four (4) preschool owners, six (6) directors, and four (4) teachers who already implemented *Success for Life* were interviewed in the study, as well as all of the four (4) early childhood professionals. Four (4) of twenty-eight (28)

teachers who will implement *Success For Life* next academic year (June 2001) were randomly sampled for interviews.

The first section of this chapter discusses the findings of the study and provides a discussion of the investigation. The second section specifies recommendations for further research.

Findings and Critique of Research

The primary purpose of the study was to identify the effectiveness of implementing *Success For Life* in Thailand. The first research question asked to what extents *Success For Life* applied to the preschool level in Thailand. The results of this question indicated that the core values and beliefs, the curriculum, the family education, the family involvement, the teacher training and staff development, the teacher's roles, the assessment, the critical thinking aspects, the teaching strategies and ideas for activities, the computer and technology, the class size, and the community involvement were applicable to the Thai preschools.

The findings agree with the Castro's study (1998) which found that after the *Success For Life* teacher training program, teachers were more able to apply new knowledge about brain research and development to their programs. Teachers are also better able to make connections between the findings of brain research and classroom applications and provide children with appropriate, stimulating, and enriched environments and materials.

The findings are also consistent with the Kantabura's article (2001). According to Kantabutra, children should receive training on how to solve problems using analysis and

thinking skills (Kantabutra, 2001). Thai people lack critical thinking and analysis skills because they are taught to believe that teachers always speak the “truth” and that good students are the ones who believe every word their teachers say is truth. As a result, Thai students lack experience in critical thinking. Students must be taught to solve problems with analysis and thinking skills and realize that their teachers are not always right and that there may be more than one correct answer or solution to a problem. Teachers themselves must learn to encourage debate among students in class without fear of embarrassment to themselves or to their students.

The second research question asked to what extent the *Success For Life* program aligns with public policy in Thailand. The findings affirmed that the teacher training and staff development, the educational objectives, the family and community involvement, and the child-centered approach comply with the Thai Education Act. The findings were paralleled to the Castro’s study (1998) in which *Success For Life* has supported for the national efforts by bringing together knowledge from various disciplines, such as neurobiology, music, visual arts, psychology, child development, and early childhood education. Castro (1998) indicated that *Success For Life* has brought early childhood professionals attention to the significance of the collaboration in the communities to help young children’s learning and family education.

The third research question dealt with the extent to which the *Success For Life* program conformed to the Thai culture. The findings revealed that the children’s roles in the *Success For Life* classroom are consistent with that of the Thai culture. The participants agreed that children in the classroom spend time attending and engaging in

learning activities, work independently, work in small groups with others, demonstrate character traits such as independence, patience, courtesy, and respect, and respect individual differences and varying learning abilities of peers. The findings supported the article by Mahidol University (2000) that Thai children are taught to develop a sense of responsibility, respect, cooperation, courtesy, and honesty.

The fourth research question asked about what changes *Success For Life* are necessary for it to align with the Thai educational system and culture. The findings indicated that *Success For Life* should modify the following contents: teacher training and staff development; the curriculum; the child-centered approach; children's rights; and classroom research. The teacher training should add the content of teaching strategies for children with different learning styles, children with special needs, and children in the English as a Second Language program. In addition, the teacher training should provide information about critical thinking and problem solving in the classroom. Teachers should be able to explore questioning techniques.

The mathematics curriculum should be modified to include higher-level concepts. The social studies curriculum should be modified to match with the Thai social and cultures. The *Success For Life* curriculum should include moral education such as characteristic traits of responsibility, cooperation, honesty, and respect. In addition, the *Success For Life* courses of study should include financial education addressing concepts of the value of money, spending, and saving.

The present research supports the philosophy of Matsuura, Head of the United Nations Educational, Scientific and Cultural Organization. According to Matsuura, moral

education will help Thailand avert a financial crisis in the future. Matsuura revealed, “Literacy skills and sciences are important elements of basic education, as well as morals, national traditions and human logic” (Manibhandu, 2000). Furthermore, the findings are consistent with Patrician’s report (1999), in which it was concluded that children should receive training about financial education. Patrician (1999) indicated that American children did not understand the money value because they have never been taught about money in school. In response to the findings, John Nuveen’s KidSense company created “KidSense,” a financial education program aimed at helping youngsters develop money skills, including the meaning of buying, selling, trading, saving, and investing. The *Success For Life* curriculum should concern, not only with regard to the contents of financial education but also children’s age levels. The present findings also support the Education for All 2000 Assessment report in which stated, “Thai teachers were not appropriately trained to have teaching skills for each specific type of student with special needs.” (Cabrera, 2000). Thai teachers need knowledge and experiences associated with students who have special needs.

Moreover, the results indicated that teachers were unclear with the terminology of “a teacher-centered,” “a child-centered,” and “a teacher-directed-child-centered.” The participants suggested that the *Success For Life* should clarify the terminology of “a teacher-centered”, “a child-centered” and “a teacher-directed-child-centered.” In addition, the results indicated that “a teacher-directed-child-centered” is more appropriate to use in Thailand than “a teacher-centered.” The findings also indicated that the children’s rights, which stated in the *Success For Life* curriculum that every child has the right to access

and participate to the American Dream, should be changed to the Thai Dream. The Thai Dream includes developing academic skills, thinking critically, and developing characteristics traits.

Finally, the findings indicated that the *Success For Life* teachers should be able to conduct the classroom research. The participants suggested that the *Success For Life* teacher training should train teachers how to conduct the classroom research so that the research findings will support the children's learning.

The last research question asked what components are necessary to develop a model and process for electronic mentoring of teachers involved in *Success For Life* in the Thailand project. The findings indicated EnVision, a two way audio-visual desktop interactive systems which utilize internet links, saves cost and time. However, EnVision is still not used advantageously and there are barriers that hinder its use. Barriers discussed by participants included time difficulty, inconvenient access, EnVision unavailability at the preschools, and lack of knowledge of using EnVision by teachers. Suggestions are that teachers should receive training on the use of EnVision and computer application.

Recommendations

The results of the study suggested changes needed to improve the future development and implementation of *Success For Life* in Thailand schools. The following recommendations appear to be supported by the study's findings:

1. Participants did not give enough information in the section of short answers in the questionnaire. In any future study, the researcher should interview the participants by

asking them the same questions in the questionnaire. This would bring forth additional information that could be of benefit to the subsequent training. In addition, the interview would help reduce vagueness in the participants' responses.

2. Creative and critical thinking are emphasized in the Thai Educational reform movement. Future studies should examine ways to enhance students' critical thinking skills.

3. Future *Success For Life* studies in Thailand should examine ways to encourage parents and families, early childhood experts, and policymakers to collaborate and transform information in early care and education through innovative partnerships between public schools, child care providers, community organizations, and local business.

4. Future *Success For Life* studies in Thailand should concentrate on finding ways to educate parents and families. Parents play crucial roles in stimulating and nurturing children; however, they may not have the information or experiences necessary to help their children succeed in school and life. Parents should be included in the group of subjects for the study because they can provide information concerning their children's development and behaviors.

5. Future *Success For Life* studies in Thailand should be conducted with a longer duration for data collection. The participants in the present study suggested that they should receive at least 3 *Success For Life* training within a year. The training should include the contents of teaching techniques for children with special needs, children with different learning styles, and children in English in a Second Language. In addition, the

training should include teaching techniques to promote children's critical thinking. There is a need for further research investigating preschool children's ability and achievement related to teacher instruction after they receive *Success For Life* training.

Summary

Success For Life has demonstrated success in implementing a program of enrichment that incorporates current knowledge of brain development and. The program supports the optimal development of the whole child. *Success For Life* encourages early childhood professionals, psychiatrists, neuroscientists, educators, and businessmen to collaborate and attend to the importance of early childhood education and care. Such collaborations are likely to be more productive than traditional discipline teams. *Success For Life* conforms to the Thai educational system, the National Education Act (1999), and the Thai culture. There are only a few aspects that Thai early childhood professionals suggested for modification. Difficulty may arise at the first implementation of *Success For Life*, but once communication is established, the possibilities for increasing the quality of early childhood education could be everlasting. Continued research efforts, reflections on such efforts, and strong partnerships between the team of *Success For Life* at the University of North Texas and the *Success For Life* educators at Kasetsart University will improve the quality of early childhood programs in Thailand as they move into the future. The stronger the start, the better the finish.

APPENDIX A
DESCRIPTION OF STUDY AND CONSENT FORMS

UNIVERSITY^{of} NORTH TEXAS

Office of Research Services

May 9, 2001

Chalatip Samahito
724 S. Welch Apt. #8
Denton, TX 76201

Institutional Review Board for the Protection of Human Subjects in Research (IRB)
RE: Human Subject Application #00-232

Dear Ms.Samahito,

The UNT IRB has received your request to change the title of your study "Evaluation of the Implementing *Success for Life*, A Brain-based Early Childhood Program in Thailand." The study is now titled "*Success for Life* in Thailand: Educational and Cultural Implementation." As required by federal law and regulations governing the use of human subjects in research projects, the UNT IRB has examined this modification. The modification to this study is hereby approved for the use of human subjects.

The UNT IRB must re-review this project prior to any other changes you make in the approved project. **Federal policy 21 CFR 56.109(e) stipulates that IRB approval is for one year only.**

Please contact me if you wish to make changes or need additional information.

Sincerely,



Peter L. Shillingsburg
Chair
Institutional Review Board

PS:sb

Teacher Consent Form

I, _____, agree to participate in this study of implementing *Success For Life*, the brain-based early childhood program, in Thailand. The purpose of this study is to address the effectiveness of implementing the *Success For Life*, a brain-research based early childhood program, in Thailand.

As a participant, I understand that my involvement will include a pre- and a post-intervention interview with the researcher. This interview will be one hour in length and will take place wherever is convenient for me. Furthermore, my participation in the study involves bi-weekly journals. I will be asked to write short journals about my practices and changes in the classroom twice a week.

I have informed that the investigator will not reveal my name on the study findings. All information will be kept strictly confidential and will be used for research purposes only.

I understand that there is no personal risk or discomfort directly involved with this research and that I am free to withdraw my consent and discontinue participation in this study any time. I also understand that at the end of the study, the researcher will make a summary of group results available to me for my participation in the study.

If I have any questions or problems that arise in connection with my participation in this study, I should contact Chalatip Samahito at (940) 369-7779 (work) or (940) 243-7873 (home) or Prof. George S. Morrison in the Department of Counseling, Development, and Higher education at (940) 565-4477.

Date

Participant Significant

This project has been reviewed and approved by the UNT Committee for the Protection of Human Subjects (940/565-3940)

APPROVED BY THE UNT IRB
FROM 11/15/00 TO 11/14/01
(24)

APPENDIX B
LIST OF IMPLEMENTATION SITES

LIST OF IMPLEMENTATION SITES

1. Kasetsart University Laboratory School, Kampangsan Campus
1/1053 Malaiman Rd.
Kampongs, Nakornpathom
Director: Assistant Prof. Parichart Chanpen
Phone: (034) 351-396
2. Kasetsart University Laboratory School, Bangkhen Campus
50 Paholyothin Rd.
Jatujak, Bangkok 10900
Principle: Associate Prof. Kuakul Tasit
Phone: (02) 579-1542
3. Pattanadek Preschool
144/1-3 Srijun Rd.
Muang, Konkhaen
Owner & Executive Director: Ms. Songsiri
English Program Director: Mrs. Martha Ruby
Phone: (043) 222-869
4. Junjao Preschool
152/12 Nanglinjee 6 (Gengchuan)
Sathorn, Bangkok 10120
Director: Mrs. Au-umpai Suwanyuen
Phone: (02) 300-286-3809
5. St. Mark International School
900 New Rama 9 Rd.
Suanluang, Bangkok, 10250
Owner & Executive Director: Mr. John Ruangmethanon
Director: Mrs. Listati Ruangmethanon
Phone: (02) 300-5463-4
6. Ornicha Kindergarten
327/80 Vipavadee Rd.
Tungsonghong Luksee
Bangkok, 10210
Owner & Executive Director: Mr. Eakarat Limkiatiphairat
Director: Mrs. Pichaya Limkiatiphairat
Phone: (02) 573-4841

7. Pranantanit Preschool
973 Lardprao 48
Huaykwang, Bangkok 10230
Owner & Executive Director: Dr. Prachumporn Suwannatra
Phone: (02) 275-9879

8. Maneeya Preschool
100/321 Soi Ta-It Rattanatibet Rd.
Huaykwang, Bangkok 10310
Director: Mr. Siripong Tinnarattana
Phone: (02) 594-4043

APPENDIX C

CHILD EVALUATION MEASURE-REVISED (CEM-R)

Child Name: _____ Child ID#: _____

Teacher Name: _____ Teacher ID#: _____

School: _____

**Success For Life, University of North Texas
Child Evaluation Measure-Revised (CEM-R, 2000)**

Pre-K (3-5 years)

Deborah Hammond Atkins, Ph.D. and Katherine T. Kelly, Ed.D.

Please rate those skills or behaviors in each period by placing a number from 1-5 corresponding to best choice based on the following scale.

1 = Not presented (0%)
2 = Presented (10-20%)
3 = In Progress (20-50%)
4 = Mastery-Intermittent (50-80%)
5 = Mastery (80% of time)

For example = If you believe that the child responds appropriately to conversation and text read aloud through questions, comments, and actions as determined by mastery approximately 80% of the time, then place a "5" in the space for that 9 week period.

	9-Week Period			
	1st	2nd	3rd	4th
LITERACY (LISTENING/SPEAKING/WRITING)				
1. Listening Comprehension: Responds appropriately to conversation and text read aloud through questions, comments, and actions				
2. Speech Production/Discrimination: Vocalizes, pronounces and discriminates sounds and words of native language				
3. Vocabulary: Shows increased use of and depth of understanding words				
4. Expression: Integrates the learning of vocabulary speech, sounds, grammar and audience to communicate effectively				
5. Phonological Awareness: Exhibits understanding of how words sound apart from their meaning				
6. Written Expression: Scribbles or writes with purpose approximating conventional writing				
READING				
1. Functions of Print: Uses print to gain meaning and convey meaning				
2. Print Awareness/print Concepts: Understands that print carries meaning, and looks different from drawings; that written text is divided into words and moves from left to right				
3. Letter Knowledge and Early Word Recognition: Recognizes some printed alphabet letters and words (usually own name) and understands the relationship role between letters and sounds				
4. Motivation to read: Displays expectations and desire to become reader and writer				
5. Appreciation of literate forms: Comprehends and enjoys narrative and expository forms of print and their elements				
SCIENCE				
1. Observing: Observes and tells about details while distinguishing sounds, textures, and actions				
2. Questioning: Expresses curiosity by displaying interest and asking questions about living things and objects				
3. Exploring and Investigating: Uses tools as simple devices to investigate and form predictions; manipulate materials and tell what happens				
4. Predicting: Makes predictions and inferences based on prior knowledge and observations				
5. Comparing: Performs simple classification by comparing observed objects (guided by teacher questioning)				
6. Describing: Describes and discusses observations and knowledge about changes in weather, bodies, and plants and animals				
7. Inventing: Invents by making new combinations of things, assigning new names to objects or manipulating to solve problems				

Child Name: _____	1st	2nd	3rd	4th
Child ID #: _____				
MATH				
1. Number and Sequence/Quantitative Relationships: Uses language to describe how to use numbers to solve problems in meaningful contexts, connecting mathematical symbolic representation from experiences with print, games, and environments				
2. Patterns: Recognizes patterns in the environment and gradually begins to use patterns as a strategy for problem solving				
3. Geometry and Spatial Sense: Observes attributes of objects and uses informal language to describe shape, symmetry, space and location				
4. Measurement: Compares objects informally by length, weight or volume using comparative vocabulary (taller/shorter/same) etc., serration, and relative time (morning, afternoon, etc.)				
5. Classification: Uses the attributes of objects to sort into groups				
MUSIC EDUCATION				
1. Can distinguish among sounds of common instruments				
2. Able to identify basic music dynamics: high/low, treble/bass, loud/soft, fast/slow				
3. Singing - sings with a group or independently; expresses feelings through singing				
4. Plays classroom instruments - plays classroom instruments with a group or independently				
5. Rhythm - Can keep a steady beat and match rhythms of moderate complexity				
6. Moves to music using props and matches movement on signal				
7. Can sing while performing other body movements or while playing a classroom instrument in rhythm				
CREATIVE AND VISUAL ARTS				
1. Creates original art work				
2. Describes his/her own creations and artwork to others				
3. Identifies colors, textures and includes forms in the environment				
4. Expresses feelings through movement				
5. Creates or recreates stories, moods, or experiences through dramatic representations				
6. Engages in dramatic play with others				
TECHNOLOGY				
1. Proper care of hardware				
2. Technology terminology				
3. Data input skills				
4. Information acquisition				
CHARACTER EDUCATION				
1. Displays character trait of responsibility				
2. Displays character trait of cooperation				
3. Displays character trait of respect				
4. Displays character trait of compassion				
5. Displays character trait of self-discipline				
6. Displays character trait of selflessness (altruism)				
7. Displays character trait of trustworthiness / honesty				
8. Displays character trait of courage				
9. Displays character trait of tolerance				

Child Name: _____ Child ID#: _____

WELLNESS AND HEALTHY LIVING (SELF-HELP/NUTRITION/SAFETY)

1. Begins to demonstrate responsibility for self-help requirements	1st	2nd	3rd	4th
2. Begins to recognize routine healthy behaviors and demonstrate responsibility for personal hygiene requirements				
3. Learns about basic needs for human survival				
4. Learns about fundamental safety/health concepts				
5. Knows parts of the body				

SOCIAL

1. Uses appropriate language and actions to display courtesy to others	1st	2nd	3rd	4th
2. Child can verbalize information about self				
3. Child demonstrates responsibility				
4. Functioning in the classroom; follows rules				

EMOTIONAL

1. Shows consideration of others	1st	2nd	3rd	4th
2. Displays positive self-concepts				
3. Uses self-discipline when necessary				
4. Good comprehension of emotion vocabulary				
5. Recognizes he/she can play a role in influencing someone else's emotional state				
6. Will suggest maternal nurturing strategies to soothe someone else's emotional state				
7. Shows empathy toward others				
8. Temperament: The child's temperament is primarily: (check all that apply)				

	1st 9-weeks	2nd 9-weeks	3rd 9-weeks	4th 9-weeks
Easy-Going				
Conscientious/Agreeable				
Outgoing/Active				
Challenging				
Shy/Withdrawn				
Emotionally Reactive				
Exhibits Positive Self Control				

PHYSICAL/MOTOR SKILLS

1. Demonstrates basic locomotor skills	1st	2nd	3rd	4th
2. Demonstrates ball-handling skills				
3. Demonstrates advanced locomotor skills				
4. Fine motor - Demonstrates pre-writing/writing skills				
5. Fine motor - Demonstrates paper folding skills				
6. Demonstrates scissors skills				

APPENDIX D
QUESTIONNAIRE

University of North Texas

College of Education

Success For Life in Thailand:
Educational and Cultural Implementation

Preschool
(4 to 5 years and 6 months)

Teacher Survey Questionnaire
(Pre-training)

Section I

Project ID Number:

This section asks information about you and your classroom. Please circle the appropriate number that best suits you.

1. Your gender
 1. Male
 2. Female
2. What was your age on your last birthday?
 1. under 20 years
 2. 21-30 years
 3. 31-40 years
 4. 41-50 years
 5. above 50 years
3. During the day, how many children typically are present in your classroom?
 1. fewer than 20 children
 2. 21 to 25 children
 3. 26 to 30 children
 4. 30 to 35 children
5. How long have you been working as a teacher in general?
 1. less than 1 year
 2. 1-2 years
 3. 3-5 years
 4. 6-8 years
 5. more than 8 years
6. What is your educational background?
 1. High school graduate or GED
 2. Bachelor's degree completed
 3. Master's degree completed
 4. Ph.D./Ed.D./ other professional degree (nursing, medical)
 5. Other (please specify)_____
7. If you have a degree, is your degree/professional background in Child Development or Early Childhood Education?
 1. Yes (go to question #9)
 2. No (go to question #8a, 8b, 8c)

8a. If your degree is not in Child Development or Early Childhood Education, what was your major? _____

8b. Did you have any professional training related to Early Childhood Education or working with young children?

1. Yes
2. No

8c. Did you have any course work related to Child Development/Early Childhood Education?

1. Yes
2. No (answer the next question)

9. Did you have any professional training/certificate related to ECE or working with young children?

1. Yes
2. No

10. What relationship do you understand between brain research and children's learning? Please explain.

11. What is your understanding of the phrase "developmentally appropriate" practices?

12. In what ways does the philosophy you currently use in the preschool differ from the *Success For Life* philosophy?

14. What knowledge, learned from the *Success For Life* training, do you plan to use in your classroom?
15. How do you think *Success For Life* training will contribute to your professional development?
16. Do you believe the *Success For Life* is appropriate to use in Thai culture? Please explain.
17. Which aspects do *Success For Life* should be changed so as to be suitable for Thai culture?
18. Do you believe the *Success For Life* program is applicable at the preschool level in Thailand? Please explain.

University of North Texas

College of Education

Success For Life in Thailand: Educational and Cultural Implementation

Preschool
(4 to 5 years and six months)

Teacher Survey Questionnaire (Post-test)
(Post-training)

Section I

Project ID Number:

This section asks information about you and your classroom. Please circle the appropriate number that best suits you.

1. Your gender
 1. Male
 2. Female
2. What was your age on your last birthday?
 1. under 20 years
 2. 21-30 years
 3. 31-40 years
 4. 41-50 years
 5. above 50 years
3. How many other teachers do you have such as assistants or helpers in your room to help you throughout the day?
 1. I have worked alone and do not have an assistant.
 2. I have one assistant.
 3. I have two assistants.
 4. I have three assistants.
4. During the day, how many children typically are present in your classroom?
 1. fewer than 20 children
 2. 21 to 25 children
 3. 26 to 30 children
 4. 30 to 35 children
5. How long have you been working as a teacher in general?
 1. less than 1 year
 2. 1-2 years
 3. 3-5 years
 4. 6-8 years
 5. more than 8 years
6. What is your educational background?
 1. High school graduate or GED
 2. Bachelor's degree completed
 3. Master's degree completed
 4. Ph.D./Ed.D./ other professional degree (nursing, medical)

5. Other (please specify) _____
7. If you have a degree, is your degree/professional background in Child Development or Early Childhood Education?
1. Yes (go to question #9)
 2. No (go to question #8a, 8b, 8c)

8a. If your degree is not in Child Development or Early Childhood Education, what was your major? _____

8b. Did you have any professional training related to Early Childhood Education or working with young children?

1. Yes
2. No

8c. Did you have any course work related to Child Development/Early Childhood Education?

1. Yes
2. No (answer the next question)

9. Did you have any professional training/certificate related to ECE or working with young children?

1. Yes
2. No

10. What do you like best about *Success For Life* program?

11. What do you like least about *Success For Life* program?

12. List 3 things you learned from the *Success For Life*?

13. When you implement *Success For Life* in your classroom, what do you think you will need the most help with?

14. In what ways does the philosophy you currently use in the preschool differ from the *Success For Life* philosophy?

15. What knowledge, learned from the *Success For Life* training, do you plan to use in your classroom?

16. How do you think *Success For Life* training will contribute to your professional development?

17. Do you believe the *Success For Life* is appropriate to use in Thai culture? Please explain.

APPENDIX E
BIMONTHLY JOURNAL

Journal Entry

Journal entries must be made twice a week and should be faxed (940) 565-4952, emailed to chalatip_@hotmail.com, or mailed to Ms. Chalatip Samahito 50 Paholyothin Rd. Jatujak, Bangkok 10900.

-
1. What changes did you make in the classroom environment during this period of time? Why? How did it benefit the children?

CHANGE 1:

What?:

Why?:

How did the change align with Thai public policy?

How did the change comply with Thai culture?

CHANGE 2:

What?:

Why?:

How did the change align with the Thai public policy?

How did the change comply with the Thai culture?

Use additional paper if necessary

2. What experiences did you provide the children related to brain research during the period of time?
 - 1.
 - 2.
 - 3.
 - 4.
 - 5.
3. **Journal entry:** Please write your thoughts and feelings about the process of implementing the *Success For Life* curriculum.

APPENDIX F
INTERVIEW PROTOCOL

INTERVIEW PROTOCOL

Title: *Success For Life* in Thailand: Educational and Cultural Implementation

1. What do you think about *Success For Life*?
2. What is your idea in implementing *Success For Life* in Thailand?
3. What extent does *Success For Life* apply to the preschool level in Thailand?
4. How did you apply knowledge you learned from the teacher training to the classroom?
5. What is the role of the teachers in the classroom?
6. What is your idea about the *Success For Life* curriculum?
7. What makes you like *Success For Life*?
8. What contents in *Success For Life* do you think that matches with the National Education Act B.E. 2542 (1999)? To what changes to *Success For Life* are necessary to comply it with the educational system?
9. To what extent is *Success For Life* are necessary to comply with Thai culture? To what changes to *Success For Life* are necessary to comply with Thai culture?
10. What components are necessary to develop a model and process for electronic mentoring of teachers involved in *Success For Life* in Thailand?

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